



How to Identify the Stations: Slogans, Studios, Owners and Mail Addresses of All Broadcast Stations How to Build a Simple S. W. Converter Learning to Tune the Short Waves



**B. FRANCIS DASHIELL** Technical Editor

NINTH YEAR



Editor and Publisher



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### **CONTENTS**

Frontispiece-Betty Barthell

Her	Story	is	on	Page	5

The DX Calendar of Special Programs for May	1
Building a Short Wave Converter, by B. Francis Dashiell	
Making Your Own Noise Filter	
Visiting the Stars in the Studios, by "Betty"	
Breaking Into the Short Waves, by Page Taylor	
The Editorial Consultation	11
Mingling with the DXers.	
What to Do in Case— by the Technical Editor	19
The Department of Mutual Aid	
News in High Frequencies, by the Short Wave Editor	
Building Up the Logs	
Tuning a Radio in Britain, by Percy Dodson	
What's on the Air Tonight? The Month's Programs	
Finding Your Favorite Feature. Classified Index	
The Month's Changes	
How to Identify your Stations; their Addresses, Slogans, etc.	
Complete Index of Broadcasters by Calls	
One Hundred Best S. W. Stations by Frequencies.	
The Best S. W. Stations by Calls and Countries.	
The Canadian Police Broadcasters	
Ouick Index to Station Data in Past Issues	

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# MAY DX CALENDAR

### Special Programs for Distant Listeners

A. M. time is given as the night before. Thus early Monday morning programs are listed under Sunday night. Time is given in Eastern Standard so that programs may be listed in proper sequence.

#### SUNDAY NIGHT

#### April 30th

2:30-4:00-CHWK, 665, Chilliwack, B. C. 4:00-4:30-KGAR, 1370, Tucson, Ariz.

May 7th

12:00-2:00—CMCH, 1405, Havana, Cuba. 3:00-5:00—KPCB, 650, Seattle, Wash.

May 14th Noon-Noon-F31CD, 840, Saigon, Indo-China. 4:00-6:00-KFBI, 1050, Abilene, Kans.

May 7th, 14th, 21st, 28th 12:15-1:00—KSOO, 1110 Sioux Falls, S. D. 1:00-3:00—WGES, 1360, Chicago, Ill.

MONDAY NIGHT

#### May 1st, 15th, 29th

5:00-6:00-WAWZ, 1350, Zarephath, N. J.

May 8th, 22nd

4:30-5:15-WEAO, 570, Columbus, Ohio.

May 1st, 8th, 15th, 22nd, 29th

12:00-2:30-WMIL, 1500, Brocklyn, N. Y. 1:00-5:00-WSUI, 880, Iowa City, Iowa. 5:00-5:15-WCAH, 1430, Columbus, Ohio.

5:15-5:30-WHP, 1430, Harrisburg, Pa. TUESDAY NIGHT

May 16th

2:00-3:00-WJMS, 1420, Ironwood, Mich. May 30th

2:30-3:30-WCLO, 1200, Janesville, Wis.

May 2nd, 9th, 16th, 23rd, 30th

12:00-1:00—KFUO, 550, St. Louis, Mo. 2:00-4:00—CFJC, 1120, Kamloops, B. C. 5:00-6:00—KFGQ, 1310, Boone, Iowa.

WEDNESDAY NIGHT

May 3rd

2:00-2:30-WHBF, 1210, Rock Island, Ill. May 24th

3:00-4:00-KDLR, 1210, Devils Lake, N. D. May 31st

2:30-4:00 CHWK, 665, Chilliwack, B. C. 4:00-4:30-KGAR, 1370, Tucson, Ariz.

May 3rd, 10th, 17th 24th, 31st

12:00-1:00-WHBL, 1410, Sheboygan, Wis.

2:00-3:00-KFXJ, 1310, Grand Junetion, Colo. 2:30-4:30-CKWX, 730, Vancouver, B. C.

#### THURSDAY NIGHT

May 4th, 11th, 18th, 25th 11:00-12:30-WHOM, 1450, Jersey City, N. J. 12:00-1:00-KFUO, 550, St. Louis, Mo 12:00-2:30-WMII, 1500, Brooklyn, N. Y. 1:00-2:00-WBBX, 1200, New Orleans, La. 1:00-2:00-WBNC, 1420, Americus, Ga.

June 1st

4:00-5:00-KASA, 1210, Elk City, Okla,

#### FRIDAY NIGHT

May 5th

2:00-4:00-WCOD, 1200, Harrisburg, Pa. 4:15-4:45-WNBZ, 1290, Saranac Lake, N. Y.

May 12th

5:00-6:00-WJBU, 1210, Lewisburg, Pa.

May 19th 2:30-5:00-10-BI, 1200, Prince Albert, Sask.

#### May 5th, 12th, 19th, 26th

12:30-1:30-WCAJ, 590, Lincoln, Nebr. 1:00-1:30-CFCN, 985, Calgary, Alta. 1:00-3:00-CKCL, 580, Toronto, Ont. 1:30-3:30-KGEK, 1200, Yuma, Colo. 4:30-5:00-CMJH, 1150, Ciego de Avila, Cuba.

SATURDAY NIGHT

May 6th

12:00-4:00-WRBX, 1410, Roanoke, Va.

May 6th, 13th

1:00-5:00-WJEJ, 1210, Hagerstown, Md.

May 6th, 20th

3:00-5:00-10-AT, 1158, Trail, B. C.

May 13th, 27th

1:00-3:00-KUSD, 890, Vermilion, S. D.

May 20th

5:30-7:00-WRAK, 1370, Williamsport, Pa.

#### May 6th, 13th, 20th, 27th

 may sun, Isin, Zun, Zin
 9:00-2:00 — WWRL, 1500, Wookide, N. Y.
 12:00-1:00—WJBK, 1370, Detroit, Mich.
 12:00-1:30—WWA, 1160, Wheeling, W. Va.
 12:00-3:00—CMCD, 1140, Havana, Cuba.
 12:00-3:00—WWA, 1160, Wheeling, W. Va.
 12:00-3:00—CMCD, 1140, Havana, Cuba.
 12:00-4:00—WNAC, 1230, Boston, Mass.
 12:00-3:00—WBZ, 1200, Ponce City, Okla.
 1:00-2:00—CMCY, 1325, Havana, Cuba.
 1:00-2:00—CMCY, 1325, Havana, Cuba.
 1:00-2:00—CMCY, 1325, Havana, Cuba.
 1:00-2:00—CMCY, 1326, Havana, Cuba.
 1:00-2:00—KTFI, 1240, Twin Falls, Idaho.
 1:00-2:00—WGBF, 630, Evansville, Ind
 1:00-3:00—WWAE, 1200, Hammond, Ind.
 1:00-3:00—WGFE, 1360, Chicago, Ill.
 1:00-3:00—CMGE, 1375, Cardenas, Cuba.
 2:00-5:00—KFEL, 920, Denver, Colo.
 2:00-5:00—KGBU, 900, Ketchikan, Alaska.
 2:30-4:30—CKWX, 730, Vancouver, B. C.
 2:30-4:30—CKWX, 730, Vancouver, B. C.
 2:30-4:00—KDE, 1500, Santa Barbara, Calif.
 3:00-4:00—KDE, 1200, San Bernardino, Calif.
 3:00-4:00—KL20, 1200, San Bernardino, Calif.
 3:00-4:00—KL20, 1200, San Bernardino, Calif.
 3:00-4:00—KL20, 1200, San Bernardino, Calif. 9:00-2:00-WWRL, 1500, Woodside, N. Y. 3:00-4:00-KFXM, 1210, San Bernardino, Calif. 3:004:00-KXL, 1420, Portland, Ore. 3:005:00-CFCT, 630, Victoria, B. C. 4:00-6:00-KVOA, 1260, Tueson, Ariz. 4:00-6:00-XFB, 1290, Jalapa, Mexico.

#### SPECIAL

The International DXers Alliance has arranged with Station F-31-CD of Saigon, Indo-China, to broadcast for 24 hours continuously, midnight Sun-day, May 14th, to midnight Monday, May 15th, or, in Eastern Standard Time, from noon of Sunday to noon of Monday.

Here is a chance to try for real distance for Saigon is almost exactly on the opposite side of the world from Philadelphia.

[1]

### BUILDING *a* Short Wave CONVERTER

### • • • $B_{\gamma}$ B. FRANCIS DASHIELL

THE tuning limits of broadcast receivers are well known to present day listeners. Few radio sets tune above or below the 550 and 1500 kilocycles extremes of the dial. If they do, the added range whets the desire of the owner to reach into the low wave bands. But the average receiver, however, covers only the authorized band within which stations are permitted to broadcast to the listening public, and the outside wave bands remain a mystery.

Below 550 kilocycles, and above 1500 kilocycles—545 to 200 meters, respectively—are other wave bands. There is the low frequency or long wave band, and the high frequency or short wave band. Although present day listeners are particularly interested in the short waves beyond 1500 kcs., there are many who wish to delve into the long wave field. They are referred to the May, 1932, issue of RADEX, for information about building a long wave receiver.

Neither long nor short waves can be covered with the average broadcast receiver. A few sets provide for this by including the short waves in "all-wave" receivers. These have been described in the September, 1932, issue of RADEX. Some listeners use special short wave receivers to cover the high frequency band. But it is possible to use a simple, separate device in combination with any broadcast receiver so that short waves may be heard in addition to the regular broadcast programs.

Such a device is called a short wave "converter." It connects directly to the aerial input terminal of any broadcast receiver, and uses every tube and circuit of the set. The more or less obsolete short wave "adapter" is now seldom used. The adapter plugs into the detector or audio tubes of the broadcast set by removing one of those tubes, and

therefore uses only a few tubes in part of the set. For this reason it is far less efficient than the converter. Of interest to many thousands of owners of tuned-radio-frequency receivers—a. c. operated—is the fact that any converter will turn the set into a short-wave superheterodyne receiver when in use. It also may be used with any superheterodyne set for short wave reception.

#### What's on the Short Waves?

Short waves are the ones below 200 meters, or above 1500 kilocycles. Constantly more and more radio transmissions are being forced into the crowded limits of the short-wave channels. It is here that signals carry far; tuning is selective and sharp; static is less; and day time reception is good from great distances. And, too, it is here that actual radiotelephone conversations and broadcasts from fixed commercial, amateur, experimental, emergency, aviation, television, and marine radio stations, may be heard. Code, also, pours from many radiotelegraph Hundreds of stations transmitters. are in constant operation, and will provide much entertainment for radio listeners and thrills for DX fans.

The Government's control of radio has placed all types of services in assigned frequency channels. There is no control over foreign stations, and many of them will be heard scattered through the American channels. Their frequencies are given elsewhere in RADEX so they can easily be located. It is impracticable to list all the channels assigned to every type of world-wide radio service that can be heard in the short wave bands, but the United States services are arranged according to the following frequencies for radiotelephone transmissions.

#### The Various Bands

Police broadcasts, and other municipal emergency services, operate on 1712 kilocycles, and also between 2414 and 2470 kcs. The state police organizations use 1574 to 2506 kcs., while marine and harbor police and fire departments are heard on 1558 kcs. The highly interesting aviation and weather broadcasts, from airports to planes and between planes in the air, may be heard on frequencies from 2300 to 3500, 4100 to 4200, 5500 to 5700, and 6500 to 6600 kilocycles.

Ship telephone conversations and broadcasts from vessels such as the Leviathan, Majestic, Europa, etc., can be heard from 3125 to 3147. 4177 to 4197, 6650, 8830, 13,185 to 13,260, 17,600 to 17,640 and 21,575 to 21.625 kilocycles. Experimental radio relay broadcasts that are made simultaneously with regular broadcasts, from stations such as W8XK which belongs to, and relays programs from KDKA, are heard on frequencies ranging from 6020 to 6140, 9510 to 9590, 11,710 to 11,-890, 15,100 to 15,290, 17,760 to 17,-800 and 21,460 to 21,540 kilocycles.

Then there are coastal telephone services, commercial, U. S. Government, and marine, between land and ship stations. Listen for them on frequencies from 3420 to 3500, 4750 to 4775, 6460 to 6480, 8540 to 8560, 11,370 to 11,400, 12,800, 17,100 and 22.700 kilocycles. The great international radiotelephone services operate on frequencies from 3250 to 3335, 4010 to 5990, 6680 to 6980, 7310 to 8200, 8700 to 9490, 9610 to 10,990, 11,415 to 11,600, 11,900 to 12.300, 13.000 to 13.900 and 14.410 kilocycles. And of course, in between the telephone channels are hundreds of code stations arranged completely to fill the entire band from 1500 to 50,000 kilocycles.

In the amateur wave bands are many thousands of interesting privately owned stations that converse with each other throughout the country and the rest of the world. While



Guess who? It's our old friends. Amos 'n' Andy, in their every-day faces. Freeman F. Gosden, Left, and Charles J. Correll. These famous entertainers have appeared in character so many times that they must talk "Harlem" in their sleep.

much transmission is carried on by radiotelegraph, the telephone work is assigned to frequencies between 1715 and 2000, 3500 to 3550, 3900 to 4000, 14,100 to 14,300 and 56,000 to 60,000 kilocycles. No amateurs are permitted to operate between 8 and 10:30 p. m., local time.

The short wave converter is the most efficient device that can be utilized to permit reception of high frequencies on an ordinary broadcast receiver. An article about these interesting radio accessories appeared in the March, 1932, issue of RADEX. But, because so many of our readers enjoy experimenting with easily assembled radio apparatus we are presenting herewith a complete short wave converter that was designed especially for RADEX. It may be attached to any type of receiver, if a. c. operated, and will extend into the otherwise silent ether regions that teem with short-wave transmis-The converter may be consions. structed by anyone at a minimum of time, material and expense. Every effort has been made to simplify the circuit, while at the same time satisfactory performance may be assured.

Before proceeding with the actual

construction of the converter the following list of necessary parts and material should be procured, most of which usually can be found in the stock of spare odds and ends around the home workshop. The numbers given after each item refer to similar numbers shown on the drawings which serve to identify the parts.

- 1-001 mfd. fixed condenser (1)
- 2-.0001 mfd. fixed condensers (2 3)
- 2—.1 mfd. fixed condenser (4, 5)
- 1-5,000 ohms resistor (6)
- 1-50,000 ohms resistor (7)
- 1-100,000 ohms resistor (8)
- 2-4-pin tube sockets (11, 12)
- 1-5-pin tube socket (13)
- 1-6-pin tube socket (14)
- 1-50 millihenry r. f. choke coil (15)
- 8-1<sup>1</sup>/<sub>2</sub>-inch diameter plug-in coil forms, 4-prong to fit sockets 11 and 12. (16 to 23, inclusive)
- 1—wafer socket adapter to fit under any 2½-volt tube in broadcast receiver to obtain heater current to heat converter tubes.
- 1-56 type super-triode oscillator tube. (5-pin)
- 1-58 type triple-grid super-control amplifier tube. (6-pin)
- Small quantity of No. 28 double-cotton-covered magnet wire.

Full working drawings of the RA-DEX Converter will appear in the June issue. In the meantime the above list of parts may be secured by those who desire to add this superheterodyne converter to their regular broadcast receiver and thus be prepared to delve into the short-wave realm. The short waves know no season for when it is summer here it is winter in South America, Australia, New Zealand and many other parts of the world.

The second and concluding part of this article will appear in the June issue.

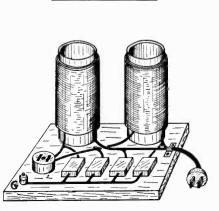
Don't forget the complete index of world stations in the June issue.

### **That Noise Filter**

For the further benefit of many of our readers the circuit diagram of the Noise Filter described in the April issue of RADEX is pictured in more detail herewith. The two coils are wound in two layers each. Start the winding at one end of the tube and put on 100 turns, then begin a second layer over the first and return to the starting point with another 100 turns. This places 200 turns on each coil, with an inner and outer end of wire. The 110-volt plug and wire connects to the outer ends of the two coils and the two inner ends connect to the socket provided for the radio set cord and plug.

The four fixed condensers are connected to a common binding post for grounding; the other ends connected to each of the four ends of the coil windings as shown also in the diagram on Page 3 of the April issue of RA-DEX. The coils and parts can be mounted on a small wooden base as shown, and round blocks fastened to the base support the coil forms in a vertical position by forcing the tubes down over the blocks.

To keep the wires from unwinding, make two small holes half an inch apart in the coil and pass the end of the wire in and out of these holes.



## VISITING the STUDIOS

**B**ETTY BARTHELL, blue-eyed, dimpled songstress from the South, whose picture beautifies our cover, first smiled at life on a sunny 16th of April in Nashville, Tennessee. Fortune has smiled back ever since. Betty can't recall one unlucky day. One day she broke a mirror, entered an audition as singer Number 13, and emerged as winner of that contest.

Less than a year after a Nashville radio manager heard Betty swing into lively lyrics and tinkling tunes over a grand piano in a Nashville drawing room, she was swept to star-Betty seems to be what is dom. known in the studios as a "natural." Prior to her role on a nationwide network, her chief bid to fame was as national president of the alumnae association of Ward-Belmont College, Nashville's finishing school, Turning back to the still fresh print in her college vearbook, we find Betty catalogued as "personality, pep and popularity-plus."

Betty never dreamed that radio was to be her career. She had occasionally thumped out popular melodies on the piano and hummed a tune or two. These talents, developed "by ear," were limited to school-girl gatherings and her first job was playing for classroom folk dancers in the Ward-Belmont gym. Betty was graduated from that cloistered atmosphere in 1928 and plunged immediately into the spirited social life of the southern city.

#### Coaxed into Radio

Only by much coaxing did a director of WLAC, Columbia's Nashville station, drag Betty to the studios. Before she knew it was anything more than a lark, he had sold her talents as a feature of the program presented by the local Para-

• • with "Betty"

mount-Publix theatre. Subsequently, she was heard by Columbia's program director, Julius Seebach, and immediately taken to New York.

"Just born under a lucky star," is the way Betty sums it up, admitting in the next breath that she always wears a lucky coin in her shoe and carries, for good luck, the pieces of that broken mirror in her handbag. Only one shadow—and it's not very dark—fell across her sunny path to fame.

#### Family Wouldn't Listen

The Barthel family frowned on theatrical life. For six months they refused to buy a radio to hear Betty sing. But when she came home last Christmas with the world in a jug, Mr. Barthel figured it was high time the family tuned in. Now it's a big night in Nashville whenever Betty sings.

In New York, Betty lives with two southern girlhood friends in a Greenwich Village apartment attended by a negro cook, Emily. On weekends she commutes to country life at Babylon, Long Island. Betty picks ice hockey and rides atop Fifth Avenue buses as the most thrilling sights in New York.

SIDE GLANCES: Has big, vivid blue eyes, a wealth of black bobbed hair; is equally captivating in sport or evening dress; confesses she has a weakness for black and white clothes; divides much of her time between dancing, sports, bridge and crazy parlor games; is a rabid radio, theatre and movie fan; also likes books and open fireplaces; likes to watch crowds and celebrities, and knows no better dish than old-fashioned home-made vegetable soup.

Heretofore billed as Elizabeth, she shorted her name to the thirteen-letter monicker, Betty Barthell. Listen in any Monday at 10:00 P. M., or Friday at 8:00 P. M., EST., over the Columbia network.



#### Andre Kostelanetz

Andre Kostelanetz, Columbia staff composer, arranger and orchestra leader, was barely twenty when he left his native Petrograd to come to the United States. He has never been back, and although the city of his birth is now called Leningrad, he always refers to it by the name it bore under the Czarist regime.

If he ever intended to return to Europe he changed his mind. He is here to stay and he is in radio to stay. Although he first became interested in radio as early as 1924, he did not have the opportunity to apply vigorously his many talents until about a year ago, when his conspicuously brilliant arrangements, both vocal and instrumental, revealed him as one of radio's foremost musical directors.

Mr. Kostelanetz is a small, competent man, whose movements in or out of the studio are brisk, almost imperative. In his office, his pencil hurries over manuscripts. In the studio, his baton is authoritative, sensitive. But during the inevitably tense moments which occur to artistic people, he displays a disarming sense of humor. He has adapted himself with ease to American customs and viewpoints, and has a charming way of mixing contemporary slang with a lingering accent which has in it the traces of many European tongues. In his adolescent years he learned to speak German, French, English, Italian, Spanish and Finnish.

His baton directs the distinctive symphonic arrangements of modern melodies heard during the Pontiac broadcasts each Thursday at 9:30 P. M., EST., over the Columbia network. He writes all of the arrangements he uses. In addition to the Pontiac program, this versatile conductor directs the "Threads of Happiness" program on Tuesdays at 9:15 P. M., EST., and many other programs.

#### Fannie Brice

Fannie Brice made her first stage appearance when she was thirteen years old. She was standing in the wings watching a young newsboy friend perform on "Amateur Night"



Fannie Brice

in a Brooklyn theatre-when someone suddenly pushed her before the footlights. She won first prize. That was the first time she knew people would actually pay her money for singing. George M. Cohan gave her a job in the chorus of one of his shows, but fired her a week later because she couldn't dance. She gave away most of her limited wardrobe to another chorus girl to teach her to dance, and finally got a job in a burlesque company. She was understudy to the leading lady and her life was dreary until the star got an abscess on her neck. "O-i-i-i, how I watched that abscess." recalls Fannie. It burst and Fannie got her chance.

Finally, she came to the attention of Florenz Ziegfeld, who put her in the Follies of 1910. She remained in the Follies for two seasons and they made a vaudeville tour in England. Hailed as a star upon her return, she re-entered the Follies in which she appeared each year until 1924.

Since leaving the Follies she has been seen in Irving Berlin's "Music Box Revue," David Belasco's production "Fannie," and in motion pictures. Her most recent Broadway appearance was in the musical revue "Crazy Quilt."

You may hear Fannie on the Royal Vagabonds program, Wednesday at 8:00 P. M., EST., over the NBC (Red) net work.

#### Fred Waring

Fred Waring is a family man. Not because he likes to stay home with his pipe and slippers and bounce the kiddies on his knee, but because his band, the justly famous Pennsylvanians, is a sort of merger of several different families.

There's Fred's brother, Tom, to complete the Waring contingent, Babs Ryan and her brothers from Kansas City, and the Lane sisters, Priscilla and Rosemary. Then there are the boys who came from Fred's home town, Tyrone, Pa.—Fred Buck, the banjoist, Fred Campbell, the flute



Fred Waring with three beautiful helpers

player, and "Poley" McClintock, the drummer who sings like a parrot with laryngitis. As head man of this interrelated aggregation and a dozen other assorted horn tooters, Fred wouldn't have much time to stay with the pipe and slippers, even if he wanted to.

The young baton waver does have some free time, occasionally, and he uses it to play golf. As might be expected from the boss of an orchestra which does so many strange things, he acts pretty strangely about golf. He doesn't care what score he makes.

He never played golf in Tyrone, Pa., when he was a youngster, because the Boy Scout business took up most of his time. He directed the fife and drum corps, and his right hand man was "Poley." Fred Campbell was the chief fife tootler, and under the able direction of this triumvirate the corps was the sensation of Tyrone. With brother Tom this trio soon became the "Scrap Iron Quartet."

The "Scrap Iron Quartet" finally got to Penn State College. Penn made a mistake almost as soon as Fred Waring arrived. It wouldn't let him join the Glee Club. He wasn't discouraged, however, and so he formed a band, and for some inexplicable reason called it the Pennsylvanians.

After graduation Fred and his Pennsylvanians went into the band business in earnest. They specialized in original treatments of popular tunes and turned out to be a bit different than other bands. They played dance engagements and vaudeville, landed in "Syncopation," one of the first of the musical movies, and appeared in three revues, "The New Yorkers," "Hello, Yourself" and "Rah, Rah Daze." They signed up for their first regular radio program with Old Gold last February.

#### Some Short Shots

It's Lieutenant Commander Vallee now. The famous singer and orchestra leader has been made an honorary naval lieutenant commander by Governor Louis J. Brann, of his native State of Maine.

\* \* \*

In response to hundreds of inquiries into the authenticity of the original Baron Munchausen, whose character is being assumed by Jack Pearl, such a person really existed. The original Munchausen (1720-1797) was born in Hanover, Germany. He fought in the Russian War against the Turks and it was after his return to Germany that he entertained his friends with his fantastic tales.

\* \* \*

London is calling those Boswell Sisters. While Connie, Vet and Martha play vaudeville in this country in addition to broadcasting, British producers have literally been pleading with their manager, Harry Leedy, to bring the girls over. A summer teur is being planned unless broadcasting commitments prevent it.

\* \* \*

Patti Pickens, the cheerful little sprite who harmonizes with her big sisters, is an accomplished tap dancer. Occasionally when the rhythm of the number the girls are rehearsing is exceptionally hot, Patti, who is only 16, goes into an expansive breakdown with her own "Gawja" interpretations. And do her sisters burn up!

# BREAKING into

HE experiences of a short wave fan may be divided into three separate stages; first, Expectancy: second, Discouragement; and third, Success. A great number of persons never reach this third stage by reason of their period of discouragement. Becoming disappointed because of their apparent inability to tune in foreign stations, they guit and forever after denounce short wave reception and receivers. It is unfortunate that this should be, both for the person concerned and for short waves in general, and it is further aggravated by the fact that this second stage is so unnecessary.

Any of several different reasons may cause one to become discouraged but no doubt the greatest reason is that most beginners expect too much from their equipment. Truly, this is no fault of the beginner, but in many cases it can be laid at the door of the person who sold him the receiver. Advertisers who promise world-wide reception as easily as tuning in broadcast band stations, who say that at a twist of the dial stations come rolling in from Capetown to Shanghai, and who paint glowing pictures of one reclining in his easy chair listening to a bullfight from Madrid or Geisha girls from Tokyo as he would listen to Amos 'n' Andy, are the ones who are directly responsible for this unhappy situation. The most reasonable manufacturers are now using more conservative advertising and as soon as all others follow this example a deplorable situation will be relieved.

The purpose of this article is to point out what may and what may not be expected of a good receiver. It is difficult to lay down any fixed rules for operating a set. The only way to learn to tune is by tuning.

Listeners are advised not to tune

## *the* Short Waves • • • *By* PAGE TAYLOR

haphazardly, but on the other hand one must tune more or less blindly until a few local stations are heard. Since stations are heard in groups at separate places and not all over the dials, it is necessary to first locate these groups, or "bands" by the local stations. W8XK is generally heard well in the 19- and 25-meter bands, W1XAZ will locate the 31meter band while the 49-meter band may easily be located by several stations, such as W2XE, W8XK, or W9XF. Whenever any of these or other stations are heard their dial readings should be recorded along with the frequency of the stations, which may be found in the station lists. After the various bands are located one should confine his efforts. to a particular band for a few days, at the following times: in the vicinity of the 19-meter band between 8 a.m. and noon; remain close to the 25meter band from noon until about 5 p. m. After 5 p. m. try the 31-meter band and after 8 p. m. the 49-meter band. In a few days the log of stations heard will no doubt exceed ten stations, perhaps all locals, but this small group will offer enough information to prepare a rough graph which will point the way to more desirable stations.

#### Making the Graph

On a sheet of graph paper, let the left hand margin represent "Frequency in Kilocycles" and the bottom margin "Dial Settings." From left to right across the bottom allow one line to represent one degree on the dial, and from bottom to top on the left hand side let about five lines represent 1000 kilocycles, starting at 2000 kilocycles at the bottom and continuing at 1000 kilocycle intervals to 20,000 kilocycles at the top. A station that has been heard can be located on the graph by placing a dot where the line representing the dial setting crosses the line representing its frequency. When all the stations are placed on the graph, curves should be drawn between the dots. As all sets require several coils to cover all the wave bands, there will be one curve for each set of coils. This is true whether the coils are changed manually or automatically. To find a required station by means of these curves it is necessary only to determine at which point the curve crosses the line denoting the frequency of the desired station. This point will be very close to the dial setting for the station. Or, conversely, if an unknown station is heard its frequency may be roughly determined from the dial setting. After a large number of stations have been heard a new graph can be drawn which will be considerably more accurate than a rough one drawn from just a few stations.

Equipped with this rough graph, the beginner has made an important step toward the interception of foreign programs. Before taning, how-



Jimmie Wallington runs Eddie Cantor a close race for popularity on the Chase & Sanborn Hour

ever, several general rules must be observed, not the least important of which is the fact that short wave stations tune very sharply and careful manipulation of the tuning controls is required. This seems difficult at first but the technique is easily acquired with a little practice. One must be sure that the station for which he is tuning is on the air at the time; the schedules given in the station lists are corrected monthly and are as accurate as any station list can be, in view of the fact that stations often make important changes. It is quite possible to hear European and Australian stations the year round but it has been found that these stations are very much better during the summer months when working on wave lengths above 22 meters and in the winter months when on wavelengths lower than 22 meters. South American and Asiatic stations are better during the winter. Finally, short wave stations change in volume from time to time. sometimes very rapidly and sometimes slowly with the seasons. Tt. often happens that a station will be inaudible on one day and heard very well the next.

#### Starting to Tune

Bearing all these things in mind the beginner is ready for his first station. The chances are very good that he will hear a foreign station after a few trials if he can answer "Yes" to all these questions: Is the station on the air now, according to the schedule given? During davlight hours, is it below 27 meters? After dark, is it above 31 meters? During the summer time, is it an Australian or European station above 22 meters? Or, in the winter-time, is it in South America or Asia, or is it a European station below 22 meters? If so, very slow tuning in the vicinity indicated by the graph already prepared will no doubt bring in the station. It may be that at that particular moment the station will be inaudible due to any one of the many vagaries peculiar to short waves,

while a half hour later it might be heard at good loud speaker strength. This is no unusual phenomenon, but on the other hand is quite characteristic of short wave reception. Therefore, do not become too easily discouraged; try again in an hour or so, meanwhile tuning for some other station.

#### Working the Phones

In tuning for stations for which no regular schedule is given, such as telephone stations, it becomes necessary to remember that these stations usually work during their daylight hours, so one cannot expect to hear European stations after 7 p. m., Eastern Standard Time, in the United States, as it will then be past midnight in Europe. Exceptions to this rule are the English phones, which maintain telephone communication with the United States twenty-four hours every day. Stations in Asia and Australia which commence in the afternoon, their time, are heard here from midnight until dawn. A good time converter is indispensable.

Another problem confronting the beginner is the question of properly identifying a station once it is tuned in. Many foreign stations announce in English but they cannot all be expected to do so. A few tips follow:

I2RO has a lady announcer who says, "Radio Roma-Napoli."

CT1AA says, "Thay tay uno ah ah," and uses a cuckoo call repeated three times as an identification signal.

TI-4-NRH announces in English and Spanish. Several signals are used, such as a bugle call between selections, Westminster chimes, a tictac, and, as a rule the operator, Sr. Cespedes, whistles in code, "Estacion TI4NRH de Amando Cespedes Marin, Heredia, Costa Rica."

Pontoise commences and ends its programs with "La Marseillaise."

YV1BC says, "Yay vay uno bay thay, Broadcasting Caracas," preceding this announcement with chimes.

(Continued on page 75)

# The EDITORIAL Consultation ••• What's New and Why

THIS might well be called the "Station Identification Number." The Index by Frequencies will be found to contain a vast amount of information relative to identification with the owner's name and mail address, the slogan used, the buildings mentioned in announcements, etc. We trust our readers will find this information extremely helpful in identifying those stations, only a part of whose announcement is caught. This information will not appear again and this issue should be carefully preserved for future use.

The June number, too, will be of unusual interest and value. The Index by Frequencies will be there but all the broadcasting stations of the world will be included in addition to those of North America. We believe that this will be the first time such a feature has ever appeared in any publication. At least, we have never seen it. We wonder if our readers realize the vast amount of research necessary to compile such a list. In North America we have the frequent and regular advices of the U.S. and Canadian governments and even in Cuba and Mexico we have occasional if irregular reports. But in the world at large we find much conflicting data which has to be checked with publications from all over the world as well as with reports from our own readers.

As we have mentioned before, the total number printed of copies of this magazine is naturally very much less in the summer months. If our readers as a consequence do not find a copy at their regular source on the first day of June, they should order a copy promptly from this office. The June issue is one that they will want to save for years.

#### Ed Wynn's Chain

Unless it is just "perfect foolishness," a new broadcasting network

will soon take to the air with Ed Wynn as generalissimo. Thirty words -no more, no less,-of advertising will be permitted at the beginning and the end of each program. In addition to being the executive head of the new system, Ed Wynn will also be master-of-ceremonies for the program instead of the usual announcer. WCDA, WBNX and WMSG, all on 1350 kcs., will merge into station WYNN which will be the key of the new chain. The first link in the new net will be called the Atlantic Seaboard Broadcasting Co. and will consist of WYNN, New York, WOAX, Trenton, WDEL, Wilmington, WPEN, Philadelphia, WCBM, Baltimore, and WOL, Washington. If this smaller succeeds, the Amalgamated net Broadcasting System, Inc., will be formed to add 37 stations in the South and 40 between Chicago and Seattle. All of the stations will be independents and of small power.

Mr. Wynn has engaged 700 actors not now on the air and says he is prepared to furnish a 16-hour program schedule daily. It is said that the new system will try the experiment of using the Western Union lines instead of those of the A. T. & T.

#### Better Not do It

As if there weren't enough mediocre programs on the air now, it is surprising how many people hanker to start a broadcasting station of their own.

Every once in a while we receive **a** letter from some reader asking if he would be permitted to build a lowpower broadcasting station provided his signals did not go outside the state. In answer to this inquiry, the Secretary of the Federal Radio Commission writes as follows: "A station of very low power, the emissions of which do not themselves transcend state lines, may nevertheless interfere with transmissions of stations outside the state coming into the state where the small transmitter is located." This would be an offense against the Radio Act of 1927. Offenses against this act are punishable by a fine of not more than \$5,000 or by imprisonment for a term of not more than five years for each and every offense. Our advice to inquirers is to try no broadcasting of any sort without a license from the Commission.

#### **Our Own Glass House**

As long as our own U.S. stations are guilty of sending out their patentmedicine advertising into the ether, their silly contests which are only lotteries in disguise, and any stargazing, fortune-telling trash they think they can get away with, we have but little right to object to the atrocities perpetrated by our neighbors. Mexico particularly, although having a number of very fine stations, depreciates their value by permitting its border stations to go the limit in dishing out muck.

"The majority of these south-ofthe-border stations seem to thrive on 'outlaw' advertising," complains Edwin F. Dreher, P. O. Box 26, La Mesa, Calif., "but not apparently outlaw for the Mexicans. You will note that XEFD, like the rest, takes pride in presenting its mental wizards. For two years or more radio listeners over the entire west were 'entertained' by the professional advice of one Ethel Duncan, broadcasting her wares from KNX, Los Angeles, supplying information for the most part in helping to locate long-lost false teeth, wallets, tie-pins, etc. Eventually, and not long ago, she became conspicuous by her absence. I was surprised the other evening to chance upon the old familiar voice away down at Reynosa, where XEAW, with its fairly strong power, reflects her master mind back across the Rio Grande. And so it goes. The Mexican invasion continues. with innumerable new stations and steady increases in power. What is our hope for the future? Shall we

have some kind of 'new deal' in the tangled affairs of international radio, or will we crowded out altogether and have to give up in despair?"

#### Canada's Good Example

Let us hope devoutly that the coming North American Radio Conference will set us free from this abuse of the great broadcasting power. In the meantime the Dominion of Canada is setting an example in its practical prohibition of advertising that will certainly be followed by other peoples unless the broadcasters themselves clean up their own house.

The Canadian Government has taken over three stations of the Canadian National Railways-CNRA. Moncton, N. B., CNRV, Vancouver, B. C., and CNRO, Ottawa This is the first move of the new Canadian Radio Commission toward governmental operation of the radio facilities of the Dominion. It is probable that the calls of the three stations will be changed as the CN call belongs to Morocco and was borrowed from that government in order that the Canadian National Railways might have calls beginning with the initials of the railroad. Incidentally, the new rules against advertising on radio programs in Canada, will probably cause the two U.S. networks to drop their Canadian affiliates.

#### "Please Print This"

"My pal wrote six pages to RA-DEX and got two lines," complains Henry Blanchard, Jr., Carlisle Barracks, Pa., who hopes he "will have better luck." Space in this publication, due to the new department on short waves, is becoming more and more at a premium. We receive hundreds and perhaps even thousands of letters each month. It is not only impossible to print them all but it is not practical even to quote from them all. We must pick those items which we believe will be of the greatest interest. We are finding it necessary to limit the number of DX reports we publish. If our readers want to help us make this magazine of the greatest popular interest and value, they will tell us just how and when they tuned in that far-distant station and not merely give us a copy of their log.

Thousands of our readers have never brought in a foreign station for example. They are keenly interested in knowing just how some one else succeeded in doing this. How many times did they try? How did they break through the barrage of U.S. stations?

#### A Brother Passes

This little note of appreciation will touch our readers, we know, as it did us. It is from Mrs. Betty Duncan, 811 W. Woodard, Denison, Texas. "In your January and February issues there were quotations from my husband, Oscar D Duncan. He passed away suddenly February 3rd. I just want to tell you as he did that RADEX is wonderful. He was a disabled veteran and the source of most of his enjoyment was through DXing. We got our Philco 91-L last August, and at the time of his death he had a log of over 300 stations. I am quite a radio fan myself and we were always so pleased when we logged a new station. Just accept my thanks for having given my late husband so much pleasure through a good radio magazine." We have already sent Mrs. Duncan the sympathy of RADEX and its readers.

#### From a Chilean Reader

From Santiago de Chile, comes a letter from Professor Luis Hernandes S. (Liceo de Applicacion, Casilla 3375), which reads in part: "I am a reader of RADEX about a year. It has been a great help for me to hear the broadcasting stations of Buenos Aires and Montivideo, and with 'What's on the Air Tonight,' I can hear every night the programs of WGY-W2XAF in a splendid way. We have several broadcasting stations in Santiago, Valparaiso, and Puerto Magallanes. I I have an RCA-Victor R-7." The list of Chilean stations furnished by Professor Hernandes will appear in the



The Neil Sisters-Lucille, Ann and Gwyneth -blonde singers of the blues, came to radio from vaudeville. On the Armour program Friday nights at 9:30 p. m. EST. via the NBC studios in Chicago.

World Index in the June issue.

#### A DX Club Directory

"Why don't you give a list of good DX clubs, their addresses, a few rules and regulations, etc., concerning each?" suggests L. E. Wallace, 110 N. Duval St., Tallahassee, Fla. "Just list only those clubs that have a good backing or have otherwise proved that they can hold together. Many DXers want to join clubs, but don't want to join those a great distance away, because they don't get the tips in time. If they have a list showing all the good clubs, they can then decide which one they want to join without having to write to all of them."

"Four other DXers and myself work together in the same office and have been in friendly competition," writes H. Crosby Forster, 124 Glenn Ave., Ottawa, Ont. "We would like to join some DX clubs so that between us we would have membership in five clubs across the continent. Could you

(Continued on page 76)

## MINGLING with the DXers ••• "Radioing Around"

HY do so many newspapers ignore the DX feature of radio? Picking up local programs is but a small part, perhaps the smaller part, of the pleasure of radio. The Newark News is an outstanding example of a newspaper which has capitalized upon the interest of the public in the distant station. They not only have a membership of 1800 in their DX club, with dues at \$2.00 for the first year and \$1.00 for subsequent years, but their DX page sends their paper all over the country. We wager that it goes into towns that do not get even the New York Times.

Radio stations, too, are over'ooking a powerful method of generating interest in radio when they fail to present at least a weekly feature of DX news. Radio becomes little more than a phonograph when it is used solely for local programs. Its greatest enjoyment potentialities lie in its marvelous power to bring the whole continent and even foreign countries into the home. No one ever received the thrill from local or chain programs, enjoyable as they may be, that the DXer gets from the far-distant station.

#### After Half a Decade

"I am returning to the fold of the DXers after an absence of over five years," writes C. Russell Riley, 215 Walnut St., Grafton, W. Va. "All of my former DXing was done in the days of crystal sets and WD and UV tubes. KFI then was an accomplishment over which we bragged. I used RADEX then and found it most useful. As I remember it, then the logging methods were practically the same with spaces for indexing station calls, but little or no editorial comment. Of course as soon as I got a chance to to DXing, I immediately return thought of RADEX and like it much

better than I did in 1924 when I first used it. I have had what I consider very good success in my attempts at DXing this time. I have a Philco 71

with 7 tubes and of the latest model. I have been logging stations since Christmas day, and to date have 240. with 15 on the west coast and 17 in Cuba, Canada and Mexico. I can get very few daytime stations, and practically none at night till after 11:00 P.M. My location is known as the worst area in town for reception, because it is in the loop of a street car line. The track is unbonded and the return takes the line of least resistance, namely, through water pipes, gas mains, etc. Of course, radio reception benefits little by this. Hence I do my radioing after 11:00 P. M."

#### Can't Get Foreigners

"I really can't get over the fact that so many DXers get so many foreign stations," questions Glen Windisch, 2542 Blaine Ave., Toledo, Ohio. "In the year and a half I have been DXing I have had only one station outside of North America, that being HJN, Bogota, Colombia. The station on 725 kcys. is no mystery. It is one of the four Vancouver stations which is supposed to be on 730. I have a very nice letter from CKMO, which says that they broadcast DX programs every Monday, Tuesday, Thursday and Friday, commencing at 11:30 P. M., PST."

"I cannot understand how some of your readers can get out of the country beyond Mexico," concludes Chester Schoenfeld, 45 Stevenson Street, Buffalo, N. Y. "I am using a Philco 7-tube and have logged 236 stations from 43 states since December 3rd." We know how tantalizing it is to read the many reports of the reception of other continents and then not be able to tune in a single one of them. Yet we also read of listeners who have tried to get these foreign stations for months, and even years, and then suddenly they begin to come in. We can only suggest that our readers make a list of the three or four foreign stations most commonly reported, such as YV1BC, HJN and Poste Parisien and then keep after them until they get them.

"There seems to be some difference of opinion as to what German broadcasts on 1157," comments Miss Florence Haist, Box 157, Lindenwold, N. J. "I sent a report of reception to Heilsberg, believing that the station was located there. My letter was forto the Sudwest-deutscher warded Rundfunk, Frankfort-am-Main and I received a reply from there saving that the program I heard was the Frankfort station. As further proof. they sent me a printed copy of their early morning program of January 14th which agrees in every detail with my reception of the station on that date. Incidentally, it is my most distant verification and am I proud?" We showed Frankfort-am-Main on 1157 in both the January and March issues, but a list of German stations just revised by the Department of Commerce shows Frankfort on 770 and Gleiwitz on 1157.

Incidentally Miss Haist wants to know why our DX Calendar gives a morning program as of the night before, when all the clubs list by actual dates.. It seemed to us that all the programs for any one night ought to be listed together and not have those before midnight in one list and those after midnight in another. We hold no particular brief for the method adopted, and if our readers would prefer to have the form used by the clubs, and they are all out of step but Jimmy, why Jimmy will get into step.

#### He Tours Japan

"Between 2:00 and 3:00 a. m., PST, before the east and middle-west opens up, my dial is little more than a tour of Japan," comments James R. Tiernan, 1470 Waller St., San Francisco, Calif. "And as to volume, there have



Harriet Hilliard, pert soloist with Ozzie Nelson and his orchestra, has joined the "tronsersfor-women" movement in her appearances from the Terrace restaurant of the Hotel New Yorker from which she broadcasts several evenings each week over the CBS.

been several occasions when I could have awakened the neighborhood if I had given full volume to the highpitched, rapid-fire chatter which they seem to feature almost continuously. It is seldom that you hear anything worth while. One night in February, however, I enjoyed a half-hour's recital of classical music on a grand piano-and announcements of course, in Japanese. It was on the network. JOAK, JOBK, etc., and came in clarion clear on four different places on the dial. Your correspondents are right that the Japs do announce in English once in a while. I have heard station announcements from both JOAK and JOIK, but have never

bothered to verify. I only wish that I had as much luck with Australia as with the Japs. Working with a Courier and a 100-foot aerial, I get Australians on occasions loud enough to recognize the musical pieces played, and, what is more aggravating, to recognize the English accent of the announcers. It is very tantalizing. But, for the life of me, I can't make out a word they say, even with earphones."

#### Tuning the Europeans

"It is much easier to hear a European station than a trans-Pacific one here on the east coast," informs Ray LaRocque, 135 Highland St., Worcester, Mass. "I have heard Poste Parisien as early as 4:30 p. m., which is before sunset out here, and they come in good, in fact louder than the New York stations at times. As I understand the French language, all announcements can be understood and at this time of the afternoon they usually broadcast phonograph recordings till about 6:00 p.m., when they sign off. I have also heard the London station on 843 kcys. before they sign off at 7:00 p.m. This station is not so regularly received because CKGW interferes. I am awaiting verifications from both. Here are some of my European catches: Trieste, Italy (verified); Stuttgart, Germany (verified); Heilsburg and Hamburg, Germany; G2LO, London, and Poste Parisien. The last four verifications are expected this month. I suggest that RADEX readers try for the Heilsburg station between 1:00 and 2:00 a. m., EST, daily on 1157 kcys. They come through very loud. I might add that although I have had some luck in logging Europeans I have never heard a trans-Pacific station, not even Hawaii."

#### Picking Up Australia

"How do the rest of the listeners fare in picking up Australian stations at this time of the year?" inquires Warren R. Davee, 222 N. Monitor St., West Point, Nebr. "I have found that Australian stations come in best from September to November and from February to April. Have been hearing Australian and Japanese stations since 1927. I use an antenna 45 feet high, consisting of three horizontal wires spaced 21/2 feet apart. This antenna is 84 feet long. Lead-in is taken off the west end and all three wires are brought down to about three feet from the receiver. The ground consists of an underground wire the full length of the antenna. The receiver is a midget Ellsworth consisting of three 224's, one 227, one 245, and one 280 tube. The receiver is perfectly balanced to receive the waves at the maximum efficiency. KSL can be tuned in here at high noon on the loudspeaker. WTAM, Cleveland; CKY, Winnipeg; KDFN, Casper, and WWL, New Orleans, all come in at high noon. But at night there is no limit."

#### Radexing in British Columbia

"On the night of January 14th. while listening at approximately 1:00 a. m., PST," writes Edmund M. Neel, P. O. Box 365, Duncan, V. I., B. C., "I heard very faintly someone say 'Hammond made a century,' followed by various other details of a cricket game. Unfortunately before anything further could be heard the station faded out. The station, whatever it was, came in between 900 and 920 kcys. As radio reception out here dur-January was extraordinarily ing good, it might not be outside the realms of posibility that I did pick up Paris. My set is a Marconiphone VIII, battery model, and when I received this cricket broadcast I was using headphones. We are situated on a hill some 200 feet above the city of Duncan, and suffer from no interference of any kind. My aerial is 75 feet long, with about 35 feet of leadin, and is raised about 20 feet off the ground, and is strung in direction NW-SE. We pick up various Japanese stations with regularity, and also have picked up XGOA in Nanking."

"I have an acknowledgement from 4RK, Rockhampton, Australia, of my outlined reception as to conversation, etc., and intermission time, during which time the crowd is proceeding to the pavilion to the bar, which will be greatly enjoyed on this hot afternoon—the players retired to their quarters for 'tay' and 'cigarettes,'" writes J. H. Hackett, 2117 Marlon Ave., Merchantville, N. J. "I also have an acknowledgment from 7HO, located at Hobart, Tasmania, stating that my reception was from 4RK, Rockhampton."

#### From Hawaii

"We who live in Honolulu are very apt to become DXers, as we have only two local stations," writes H. Harding Jones, 2531 Rainbow Drive, Honolulu, Hawaii. "Our conditions for DXing are very favorable, due to the fact that we have only the two local stations of rather low power. I have had my Radiola No. 66 since June, 1930. I am 2100 miles away from the nearest station which would be in San Francisco. My record in number of stations logged will not come up to many that I read about in your January issue, but I do consider it very good, taking into consideration my location. I have logged 178 stations, which include 37 states, Japan, Australia, New Zealand, Mexico and Canada. The Mexican stations are strong on 'Slip 25c, 50c or \$1.00 into an envelope and address Eagle Pass, Texas, etc.,' but very weak on confirmations. Japan, Australia, New Zealand and Canada are very prompt and courteous with their replies."

#### Argentine from Newfoundland

"At 4:15 A. M. GMT, I picked up LR4 on 990 kcys.," reports R. S. Furlong, 315 Duckworth St., St. John's, Newfoundland. "The announcements were in Spanish and I was only able to detect the words, 'Radio Internacional Buenos Aires.' They were radiating records, I think, since certain of the tunes were American dance hits; whilst the others were tangos and the like with Spanish words. I have asked the station for verification. The unusual thing is that at the time I was unable to bring in any of your stations. WBZ was silent, though I had been able to hear them a little earlier in the night. The only other station that I heard at the time was another Spanish-speaking one at about 910 which I believe to be a Mexican. This station was received on two sets. The first was a Pilot 'Host.' This is a midget fourtube superhet. Reception was obtained with only an inside aerial. I then picked it up with an I.C.A. 'Congueror.'"

#### **His First Foreigners**

"By following Figure No. 4 on page 3 of the February RADEX," informs Kenneth R. Leu, 1011 Haskell Ave., Rockford, Ill., "I was able to install headphones on my set with marvelous results. I have been DXing for ten years, but I had never been able to pull in a foreign station, with the exception of Cuba and Mexico, and of course Canada. However, my first night with the phones and the aid of pages 74 and 75 of



"Babs" Ryan just bubbles over with enthusiasm as she sings the choruses to Fred Waring's dance tunes on the Old Gold broadcasts, Wednesdays at 10:00 p. m. EST. on the CBS-WABC net.

the February RADEX, I pulled in 2YA, KGU, and several other foreign speaking stations that I could not identify. Two nights later I logged WKAQ and YV1BC and have sent for veris from both. I have logged a total of 531 stations from every state in the Union and seven of the nine provinces in Canada. I am using a Gulbransen 10-tube super and would like to hear from other DXers using the same make of set. Also would like to hear from owners of Scott all-wave receivers as I am greatly interested in that set."

#### "It's a Real Sport"

"I have tuned in a little 8-watt station (VE9EK), a small amateur Canadian station some forty miles from here," reports F. Gaston Fortier, C.S.E., 80 de Salaberry Ave., Quebec, Que. "They broadcast every Sunday morning from 10 to 12 o'clock. It is situated in Montmagny, Quebec. I have already over 100 letters in transit. I hold actually 89 verifications on hand. Every morning and evening I am watching the mail carrier. I get sometimes three or four and some other times over a dozen. It is a real sport for me now. Crazy? If it is, I like it very much; a real good sport is what I call it. All this is due to RADEX. It has made me very happy during this winter season and shall be always an intelligent pastime. My working note books are getting full one after the other. My file, containing copies of letters and verifications attached thereto, is getting very big."

#### B. C. vs. S. W.

"I find my interest to be about equally divided between the long and short waves," comments K. P. Williamson, 1610 Sherbrooke St., W., Montreal, Que. "I think, undoubtedly, there is more thrill attached to DXing on the b.c band than on shortwave, but on the other hand the short waves offer more variety and the added pleasure of never knowing just what is going to pop up. My only disappointment in connection with

the short waves is the fact that I have been unable to contact the wellknown VK2ME and VK3ME, but I feel that it won't be long now before I will be able to pull in one of the 'down under' stations. I was very favorably impressed by Mr. Page Taylor's section in the March issue of RADEX, as I am sure all the shortwave fans were."

#### From Farthest East

"Look at the map of Nova Scotia and see where the town of Sydney Mines is situated," requests George F. Bartlett of that city, "and when you consider that we have no stations to the east of us, I believe you will agree with me that I haven't done so badly in picking up stations on my radio. I have a 5-tube lowboy Philco and have listened plainly to KFT and KNX, both in California, and can get XER. XEAW and XEPN every night in the week, also KSL in Utah. - I have also picked up a station at least a dozen times on 413 meters giving no call letters but announcing as 'The Athlone Station, a new high-power station in Dublin and Cork, Ireland'. This comes in very plainly."

#### Verifies Moscow-Stalin

"Have just received a letter from 'Moscow Radio, Solianka 12," reports Irving Hendrickson, 33 Dane Ave., Sta. C., Worcester, Mass., "and they inform that they 'are very glad to hear that you are getting our station well' but no word about confirming or denying my report of reception. Am I entitled to call this a verification or not? During the winter they broadcast English programs every Monday, Wednesday, Friday and Sunday from 23 to 24 o'clock Moscow time. The station I heard you list as Moscow-Stalin on 707 kcs. Their address is Moscow Solianka 12, Trade Union Radio Station, Palace of Labour."

"About Dec. 1, 1932, I listened for 45 minutes to a program from JOHK and JOLK (500 watts) in the English language and sent a request for verifications," remarks Charles

(Continued on page 77)

# WHAT to DO in CASE .....

I wish to attach a pair of headphones to my Crosley, model 127 receiver, but first must know how to locate the output transformer, power tubes, and voice coil wires. Will you explain?

This receiver uses two -47 pentode power tubes, although a few sets were fitted with PZ tubes which are identical to the former.

The output transformer is attached to the loud speaker unit. You will find a plug that is used to connect to an outlet socket on the rear of the chassis of the receiver. This plug has a cable made up of four wires two green and two black. These wires run to the loud speaker and outlet transformer.

The green wires connect to the plates of the two power tubes through the socket, and then go to the terminals of the output transformer primary coil. Two short wires, soft and flexible, go from the transformer to the voice coil, which is a part of the "floating" parchment cone. These are the voice coil leads, and either one may be opened for the insertion of the switch.

#### Short-Wave Adapter With Philco

In order that I may connect my short-wave adapter to my Philco, model 95 set, I must know the location of the first radio frequency and the detector tubes. Please tell me where these are located.

The Philco 95 has nine tubes three -24's which are first, second and third radio-frequency tubes; one -27 detector; one -27 detector-amplifier; one -27 first audio; and two -45 power tubes. This is not a superheterodyne circuit, but a straight tr.f. set, which has, of course, no oscillator.

Looking down upon the set from the rear: The two -45's in the left rear are the power tubes; the -27in left rear is the first audio; the -27 just in front at the left is the detector-amplifier; the -80 is the rectifier. Of the four tubes across the front, from left to right, looking down from the rear: The first -27 is the detector-rectifier (to which the adapter should be attached); the three -24s are the r.f. tubes, of which the last, or right-hand one, is the first radio tube (to which the adapter may be attached).

#### Fading and Blurring

I have a Phileo 11-tube set that fades and acts blurred and distorted at times during evening reception, Also, the pilot light flickers. What can be done to remedy the trouble?

Fading accompanied by blurring distortion is characteristic of most distant reception, and is attributed to radio-wave interference from different stations. This effect is made more pronounced by the automatic volume control, which brings the signal in strong at its lowest field



Introducing the stars of the new Cliquot Club program, on the Blue network Mondays at 8:00 p. m. EST. From left to right, Harry Reser, conductor of the Eskimos orchestra; Jimmy Brierly. tenor soloist; Albert Kennedy "Rosey" Roswell, the Cliquot Toastmaster; and Gay, Ellis (Annette Hanshaw) blues singer.

strength when the wave interference occurs. The flickering of your pilot light does not indicate a fault in the operation of the radio circuit. It may be due to a variable load on the heater winding or plate windings of the power transformer, or possibly in the pilot lighting socket or circuit itself. The Philco light is not attached so as to get voltage fluctuations of the power input line through it. The distortion you observe is common experience of every radio set owner, and is a disagreeable effect of radio reception.

#### Using a Wave Trap

My two-tube Insuline (I.C.A.) a.c. receiver tuncs broadly. I am not using an aerial; only the ground. Will new tubes or a wave trap help sharpen tuning?

New type tubes will not increase selectivity; that is something which comes from a multi-tube circuit. One and two-tube sets are usually broad in their tuning. You must use an aerial to get distance. Try a single wire about 60 feet long placed at right angles to adjacent power or trolley-car wires.

A wave trap can be made by winding about 75 turns of fine No. 28 enameled wire on a small tube about one inch in diameter. Connect a variable condenser (.0005 mfds.) across the ends of the coil. One side (rotor) of the condenser-coil assembly should be attached to the aerial and the other to the antenna terminal of the radio set.

#### Dial Out of Place

I have a Pooley RCA model 21, 8tube set, which is not very satisfactory in operation. The set takes half a minute to warm up, and I have difficulty in separating stations 10 to 20 kilocycles apart. The tuning is accurate until 1200 kcs. is reached. Stations also tune in at less than their wave lengths, for I can get a station on 1370 that ought to be on 1430 kcs. From 1370 to 1500 kilocycles I can get only one local station, and that tunes very widely over the dial. The 10-kcs. selectivity of this set is very good, but cannot be expected within a hundred miles of a powerful station. For the type of tubes in your circuit we should judge that thirty seconds is a normal warmingup time. We do not advise changing to any other types of tubes in this set.

It is probable that the dial calibrations on your receiver have become displaced on the condenser shaft, and that to correct for proper tuning the capacity values of the trimming condensers have been decreased. This would allow proper tuning over the greater portion of the dial, but as high frequencies are reached the tuning discrepancies become greater and greater. This can be corrected by increasing the trimmer condenser capacities to about maximum value, and then resetting the dial correctly on the condenser shaft. The entire circuit, then, must be carefully rebalanced.

#### Excessive Uncontrolled Volume

My Sonora A-31 receiver does not cut down in volume. Some stations will not stop with the volume control turned entirely off, and this makes broad tuning on all stations. Condensers, tubes and resistors test perfectly. The synchro-tone modulation does not work well, and just a slight turn of the volume control gives an enormous amount of volume. Thetrouble has been getting worse for some months, and now I cannot get moderate volume from the loud speaker.

It is likely that the volume control resistor has become partially or completely short circuited. When this occurs in a cathode type of control there will be a minimum bias on the radio frequency tubes, thus the turning of the control would have no effect on the volume. This short may occur at the resistor shaft and this should be carefully inspected. Such a volume control also has a shunted fixed condenser, which, if shorted, causes similar trouble. It might be well to replace the synchro-tone modulation tube in this system. The fact that the trouble came on slowly indicates that this may be a seat of trouble. When the electron or heater emission of this tube falls off, the automatic bias provided by it is reduced, and when finally almost zero the volume can no longer be controlled.

#### **Battery Eliminator**

How can I run an "A" eliminator on a seven-tube radio battery set; and what type do you recommend?

An eliminator is not "run" on the radio set, but the set obtains its power from the eliminator. It takes the place of the filament battery, or the "B" battery, as the case may be. In the case of the A device, it converts the 110-volt a.c. power in the house circuit to a smooth current of lower voltage for the filaments of the tubes in the set.

A good "A" eliminator is perfectly satisfactory for heating your tubes. There are two general types. One uses chemically prepared cells—lead and aluminum plates immersed in a solution of borax or boric acid; and the other uses a dry electrolytic type of rectifier. The former is effective but has certain disadvantages. The latter works nicely, but the units require frequent replacing when chemically exhausted.

#### Short-Wave Converter

Can I use a short-wave converter in connection with my Silvertone tuned-radio-frequency ninc-tube receiver that I use at present with a General Motors remote control that makes my receiver a superheterodyne?

The General Motors remote control unit consists of a tuned input circuit feeding into the control grid of a detector that is coupled to an oscillator. It is just like a shortwave converter, except that it is used on the broadcast band only. Thus, in this remote control unit, the signal is brought into the control and



Sweet little Patti, youngest of the Pickens Sisters, is just seventeen. Between preparatory courses for college she collects odd goldfish and plays ping-pong. The Pickens Sisters are heard several times weekly on the NBC.

conveyed to the receiver at a broadcast frequency, and it is possible to tune in any station in the broadcast band while your Silvertone is tuned to but one frequency. Thus remote control tuning is obtained.

If a short-wave converter is attached to the antenna and ground system of your receiver the system would differ in no way from your present unit, except for the length of the waves being received. In practice, however, oscillator harmonics would probably interfere with the high-frequency signals, so it is suggested that you attach the short-wave converter directly to the receiver rather than to the remote control device. The latter must be disconnected when the short-wave converter A very short lead is reis used. quired between the short-wave converter and the receiver, whereas a long wire may be used between the remote control and the radio set.

The remote control unit actually makes a superheterodyne circuit out of your Silvertone radio-frequency set by using its radio-frequency tubes as an intermediate-frequency amplifier. And any short-wave converter does likewise; there is no need to operate these two pre-connected devices together to get the superheterodyne effect.

#### He Gets "Half-Harmonics!"

I use a small two-tube regenerative set that brings in some stations on what I call "half-harmonics." For instance, I get KNX on 525 kcs., whereas it broadcasts on 1050 kcs. Engineers tell me this is impossible for harmonics are two, three, etc., times the broadcast frequency. Yet I know this happens, and I hope you can explain the strange phenomenon.

Of course, just as radio men tell you, there is no such thing as a "halfharmonic." Harmonics are always multiples of the original broadcast frequency—never fractions. (See the January, 1933, issue of RADEX. As KNX uses 1050 kilocycles, its next harmonic must be 2100 kcs., which is above the range of the ordinary broadcast radio receiver.

However, a regenerative receiver produces a considerable amount of harmonic energy, and it is possible to receive signals on the second harmonic of the receiver (when tuned to a certain frequency). For example: If your receiver happens to be tuned to 525 kcs., so it will oscillate, its own second harmonic will be 1050 kcs. The set is thus made very sensitive at 1050 kcs. in addition to 525 kcs. Thus there will be a decided tendency to pick up a station on 1050 kcs., or KNX. The same applies to other stations on different frequencies within range of the set.

#### 56 Does Not Oscillate

The new type 56 tubes work with great satisfaction in my Atwater Kent model 72 receiver, except when in the oscillator. Why is this, and is there something that I have not done properly?

The substitution of a 56 in place of

a -27 in an oscillator circuit of any superheterodyne set has no advantage. See page 22 of the February issue of RADEX. The oscillator, although vital in the superheterodyne circuit, has little effect on the volume, sensitivity or tonal qualities of the receiver.

Your oscillator will not work with a 56 tube, and you will have to return to the -27. The 56 should work well in other positions. There is some instability due to the high amplification factor of the 56 and a difference in internal capacities. When placed in a very critical circuit, such as the oscillator, the balance between tube characteristics and circuit design may be upset and the trouble indicated will result. A complete redesign of that particular part of the circuit in order to use the 56 is not practicable.

#### New Tubes Cause Detuning

Why is it that when I placed new 56 and 58 tubes in my General Electric radio set it tends to oscillate and tune improperly with some distortion?

When using a 56 as an oscillator amount of feed-back is inthe creased because of the improved factors of the 56 tube. In order to maintain stable operation it would be necessary to redesign some of the circuit. Substitutions of the 56 can not be made in such critical circuits. See answer to preceding question. When 57s and 58s are used in radio-freand intermediate-frequency auencv sockets the receiver may become detuned because of the difference in characteristics of the tubes. This is more noticeable only in very critical circuits. Therefore, it becomes necessary to retune and adjust the condensers of those particular circuits using the 58 tube to eliminate distortion and improper tuning calibrations.

#### Poor Tone

When I inserted new 56 type tubes in place of the -27s in my General Electric receiver it increased the volume and power but changed the tone to a lower quality. Can this be remedied?

When you replaced the -27s in your 9-tube G. E. set you substituted also a 56 in the oscillator and the second detector. The 56 does not make an efficient oscillator in old sets, but serves well as a second detector and amplifier. Your audio oscillator. which is the tube second from the right when looking down upon the chassis from the front, must use a -27 tube. The greater amplification factor of the 56 caused higher feedback and caused tone distortion.

#### Automatic Volume Control

I wish to install an automatic volume control in my model 80 RCA receiver. If this can be done, I would like to have simple instructions.

The RCA 80 can be fitted with an a.v.c. tube and a 56 is recommended for this purpose because the additional filament drain will be negligible. The grid return circuits of the first radio-frequency tube, the first intermediate-frequency and second intermediate-frequency tubes. are opened between the lower ends of the radio-frequency transformer coils (secondaries) and the ground, and fixed condensers of 0.1 mfd. capacity are inserted in series. Then procure three resistors of 250,000 ohms each

and attach to the grid returns on the tube side of the condensers just inserted. Connect the outer ends of the resistors together and run a short lead to the plate of the new 56 a.v.c. tube.

The automatic volume control tube is installed as follows. The cathode is connected through a 25,000 ohm resistor to a tap on the first filter choke coil which also happens to be connected to the speaker field coil. The grid of the tube is connected to the plate of the second intermediate-frequency tube, a -24, through a small .00025 mfd. by-pass condenser. The grid also is returned to the cathode circuit of the same 56 tube as shown by passing through a 2 megohm resistor, and the plate is by-passed also to the cathode by means of a 0.5 mfd. condenser. The plate of the 56 then is grounded through a 100,000 ohm resistor.

The heater of the 56 a.v.c. tube is connected to the 2.5-volt filament supply. After all is completed it may be necessary to readjust the circuit for radio and i.f. alignment for perfection of tuning. We do not advise the use of 57s or 58s elsewhere in the receiver when this control is added.

#### **Condensers Do Not Track**

My model 56 Majestic set works well from 550 to 850 kcs., (555 to 350 meters) but fails to give satis-

Have you heard the "Radio Rubes," the four hillbilly singers who are heard Sunday morning at 11:00 on the "Red"? Left to rights John Laby, Rufe Davis, Neal Laby and Arty Hull.



faction from 350 meters down (850 to 1500 kcs.). How can I remedy this trouble, and will some of the newer tubes help?

New tubes cannot help this condition, and we do not advise them in this particular circuit. Your set was carefully designed for the particular tubes now in use.

Your trouble seems to be one of "tracking" of the oscillator and tuner condensers on frequencies above 850 kilocycles. The manufacturers of this superheterodyne receiver have provided facilities for oscillator padding which allow for perfect tracking of the oscillator exactly in step with the tuner system. When both of these circuits track properly the tuning will be perfect from end to end of the dial. Since this matter is one requiring much experience and ownership of certain precision apparatus, we advise that you obtain the services of a competent repair man to look into this phase of probable trouble.

#### Silencing Dual Speakers

My Lafayette 10-tube set uses new type tubes with -47s in the power output, and it has dual-speakers. How can I find the voice coil wires so as to connect headphones as suggested in the February issue of RADEX?

We suggest that headphones be connected as shown in Figure 4, page 3, of the February issue of RADEX. You will need two wafer adapters such as is shown at B in Figure 2, page 2. The phones are then connected as shown in Figure 4, with two condensers of 0.5 mfd. capacity each, and a resistor of 25,000 ohms in series with the plate lugs of the two adapters selected.

The silencing switch S is placed in the lead from the output transformer to the voice coil of the largest speak-The voice coil of the additional er. or smaller speaker is connected by soft flexible wires across the voice coil of the larger speaker. The dual speaker must be treated as a single speaker, and the silencing switch placed in one of the leads from the output transformer, as mentioned on page 4 of the February issue. The transformer and voice leads are a part of the dual speaker arrange-

(Continued	on	page	75)	

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# The DEPARTMENT of MUTUAL AID

#### Answers

"In answer to Mr. E. F. Gross of Brooklyn," writes B. L. Ahman, 3313 Westerwald Ave., Baltimore, Md., "I would like to say that the station he hears around 725 is not any of the Vancouver stations, because I hear them and that station also. Its signals are strong enough to let me hear the music, but the announcements are too weak. I have been hearing this station every morning that I have been DXing for the last several weeks. The first time was about the first of February. It must be 2YA, since that's the only one that I can figure it to be. Tell Mrs. Weaver of New York City that the short-wave lists in your December issue carry WPEF, Bronx, New York, as on 2450 kcys., and as she tuned in on 1220 kcys. she was probably hearing a harmonic. 1225 was probably the frequency she had. Maybe the burglars weren't so far away after all."

"I notice that C. H. P., of Blenheim, Ont., is puzzled by receiving CFCO on 870 kcys., when they are operating on 1010," writes Edward C. Houlgate, 351 Adelaide St., London, Ont. "I cannot explain this, but I have experienced the same thing When our local CJGC was twice. using 910 kcys., I received them one evening on 950 kcys. also. I also heard XED on 1000 kcys. one evening when they were operating on 960. You will note that in each case the station was heard 40 kcys. from its regular wave. These stations were not operating off frequency on these occasions as they were both on their correct frequencies at the same time. I put it down to some peculiarity of the superhet circuit."

"In answer to a letter in the March RADEX by Mr. J. W. Brauner," remarks Edwin E. Hatch, 5508 North

Mascher St., Philadelphia, Pa., "the station that he heard last Cristmas morning broadcasting greetings to the Islands of the Pacific, was VE9JR in Winnipeg, Man., on 25.60 meters. I heard the entire program here in Philadelphia and I certainly enjoyed I also have a new Police station it. to report. The station is WPFF located at 33 Washington St., Toms River, N. J. I heard them testing from 9:09 till 9:30 p. m. EST., March 6th. Their frequency was given at 2430 kcys. and they are using 50 watts power."

"I am almost positive Mr. Rowe of Grand Junction, Colo., heard that wrestling match from 4QG in Brisbane, Australia," opines Kenneth Page, Silver Creek, N. Y. "The first time that I ever tuned in 4QG, I listened to a wrestling fight from about 6:20 a. m. to 7:00 a. m., EST. Wrestling in Australia differs from that in this country in that it is fought by rounds. This is commonly known as the Australian style of wrestling." Kenneth wants to know how to get a verification from LR-4 in Buenos Aires, Argentine.

"In regard to the letter of Mr. T. W. Rowe of Grand Junction, Colo.," advises Raymond Corbett, 619 12th St., Sacramento, Calif., "there is hardly a doubt that the station on January 28th broadcasting that wrestling match was 4QG at Brisbane, Australia. I received this station quite often, and it comes in with a good signal. It would be the only station on 760 kcys. that would say, 'You ought to see the crowd that is here tonight.""

"In the March RADEX, Harry M. Gordon, of Erie, Pa., says that he has 22 copies of RADEX," comments Charles Meyer, Jr., 411 Blake St., St. Joseph, Mo. "You might tell Mr. Gordon that I have 24, and I know some people who have as many as forty. I started DXing with my first copy of RADEX, and using an old Atwater Kent I logged about 100 stations. I now use a Philco Model 87, on which I have logged 308 stations."

"I notice in the April issue that P. J. Hauss wants the identity of a new station in Mexico operating on about 1170 kcys., but announcing 1185," comments Franklyn Hoyt, 777 William St., Bridgeport, Conn. "He believes the call was XETN. Is it possible Mr. Hauss heard a harmonic of XEPN announcing their frequency of 585 kcys.?"

"I want to say a word about the station on 915 kcys. which seems to be causing some controversy," comments W. D. Crawford, 619 Victor St., Winnipeg, Man. "I have had a station there also which broadcasts without announcing, but I myself think it is the Mexican station XEW."

"Someone in the January issue of RADEX was trying to find the call letters of a Mexican station which rarely announces its call letters, on 910 kcys.," remarks J. P. Creal, Jr., La Luz, N. M. "This is very descriptive of XEW, Mexico City, which I get on 920 kcys."

"In answer to the inquiry of Howard R. Garrett of Toronto, Ont., in the February issue," reports Merton D. Niles, Hardwick, Vt., "WDEV, Vermont's best station, has increased its time on the air and is now broadcasting from 7:30 to 10:30 a. m. and 11:30 a. m. to 6:00 p. m. daily except Sunday."

#### Questions

"Can any of the readers of RADEX tell me who or what AR3, DR3, DN3, DC3 are?" inquires H. S. Trumble, Rt. 1, Box 147, Port Arthur, Texas. "I have picked them up several times on 760 kcys., which is evidently on a harmonic. Each one when finishing a conversation, usually of two or three sentences, ends by saying, 'O. K., go ahead.' Then another will cut in and say a few words ending in the same way. Would also like to hear from any of the readers of RADEX who have tried out the new type tubes in a Philco 11-tube set, Model 1931, No. 111, what advantages were gained, if any, by the substitution."

"Can someone please enlighten me as to what or whom I heard at 3:13 a. m., EST., February 12th?" inquires Miss Lilian M. Bethel, 323 First St. N. E., Massillon, Ohio. "This is what I heard: 'WOWCY, WOWCY —Ice, Sleet and Ice—Air.' This message was heard on 750 kcys., while attempting to tune in KGU. This is an incomplete message with seemingly a humming sort of interference. I take it for an airplane, as I understand they use five letter for calls."

"What Jap is on 1180 kcys.?" asks William Ellis, P. O. Box 13, Hughson, Calif. "He announced as 'JO-K, in N\_\_\_\_\_, H\_\_\_\_\_.' The third letter of the call sounded like a 'Z' but it could have been C, E, B, D, This Jap is on every Sunday etc. morning from 1:00 to 3:00 a. m. PST. They announce in English around 2:00 a.m. I logged YV1BC and HJN, with HJN the better of the two for volume. Both stations came in with fine volume and very little fading. Sure am anxious for the veris." R. M. Ballard, Visalia, Calif., also reports a new JO on 1180 kcys.

"Friday night, March 10th, a few moments past 7:00 p. m., CST.," writes Miss C. A. Brinkerhoff, 317 Clinton Ave., Oak Park, Ill., "I tried for XEW as I like to listen to Spanish, but this is what I heard, '910 kcys.' in Spanish, then English, then 'Costa Rica,' then XEW drowned out everything. Do you think I had TICR? Do they announce in both Spanish and English?"

Says Bill Hanks, R. F. D. No. 3, Fulton, Mo., "I have been receiving for the last two Saturday nights and Sunday mornings a station whose announcer has an English accent. Usually church services are broadcast from 4:00 to 6:00 A. M., CST." As this

(Continued on page 80)

# NEWS in the High Frequencies

LARGE number of short wave fans are turning to the police stations for variety and entertainment, but if they wish to continue this pastime there are certain things that should be avoided. If these things are continued we may in time find ourselves cut off from the police broadcasters as we have been from the trans-atlantic telephony stations. A letter has been received from Mr. John P. Smith, Deputy Commissioner of Police of the City of Detroit, in which his own views regarding this practice are plainly given and it is our belief that officials in other cities using police radio will agree with Mr. Smith. The letter follows, the italics being our own.

"I am emphatically opposed to citizens proceeding to scenes of crimes of which they are apprised over our radio, as it has been proven on many, many occasions that they are a detriment to the police in their investigation, and where large crowds congregate it is almost impossible for the police to adequately handle the situation.

"\*\*\*\* Sometime ago I caused an investigation to be made in this matter as we were thinking of broadcasting our messages in *code*, but \*\*\* it has not been deemed necessary to resort to the *code system as yet*."

#### **Most Interesting Station**

This month we introduce our readers to Sr. Amando Cespedes Marin, builder, owner, operator, engineer, announcer and entertainer at station TI-4-NRH, the world's most interesting radio station. During the five years of its existence this little station has built a reputation that will probably never be equalled by any other. Under its original call letters NRH, and using only 7 ½ watts power this station established several almost unbelievable distance records and made friends for its owner in every part of the world.

Sr. Cespedes recently installed a new 200 watt transmitter which has been heard very well by many of our readers. Anyone who has not yet heard these programs should tune daily on 31 meters from 5:30 to 6:30 p. m., EST. This station is easily identified by several characteristics. Announcements are always made in Spanish and English by both Sr. Cespedes and his daughter, Señorita Lidylia Cespedes Arias; the programs always close with the Costa Rican National Anthem; Sr. Cespedes plays bugle calls several times during each program, and quite often he whistles his call letters in code. Formerly, a tic-tac and Westminster chimes were used as identification signals and it is expected that they will continue to be used from time to time.



Bernardine Flynn lends the witchery and eternal mystery of her sex to Thurston the Magician's program over the Blue net each Thursday and Friday at 8:45 p.m. EST. Miss Flynn is also "Sade" of Vic and Sade, 10:15 p.m. on the blue, Monday to Friday inclusive.

L. F. Naylor, Jr., has a letter from Sr. Cespedes in which he writes. "concerning the great little NRH, I must say that we have enlarged its power. We have 200 watts nominally, and it will surely cut the ice much better, so please find it and report it good, but let me know what I say and what there is strange to report from NRH and then I shall send you our four color certificate as no other station has." Those who hear NRH should write to Sr. Cespedes at Apartado 40, Heredia, Costa Rica and receive one of his diplomas, which are 10 x 14 inches in size and suitable for framing. Others writing about TI-4-NRH are Henry King, 743 Simpson St., Atlanta, Ga. Joe L. Burkholder, Box 434, Forest City, N. C.; C. F. Glick, Box 84, Tell City, Ind., and W. T. R. Morris, Jr.

#### The British Stations

When the programs of the British Empire Broadcasting Station were inaugurated it was understood that, during the first months of operation, they would necessarily be of an experimental nature as regards wavelengths and time on the air. As is already known, this station transmits on two wavelengths simultaneously, but from time to time it is found necessary to change these wavelengths and times, these changes dependent upon the propagation phenomena of the season and reception reports received from listeners. Therefore it is difficult to keep the schedules in our lists precisely accurate at all times. As given this month they are correct as of the time of going to press, but, as the BBC advises. "Always listen for announcements because wavelengths, programs and times are liable to change," with only one or two days' notice in advance being given. These announcements are always given at the termination of the Saturday night broadcast.

It might be mentioned that when GSA is used, either GSB or GSC can be used with it, or, the station duplicating the transmissions of GSD may be either GSB, GSC, GSE or GSF. These call signs, by the way, merely refer to the frequency used and do not signify separate transmitters; there are actually only two transmitters.

We are indebted to the British Broadcasting Co., Henry King; Richard W. Mitchell, 542 Ste. Angéle St., Three Rivers, Que.; Geo. F. Sullivan, 100 Crescent Ave., Chelsea, Mass.; Allen Knain, Northwood, N. D., and R. W. Evans, for information regarding the Daventry station.

#### Time of RV-59

Mme. Inna Marr of the Trades Union Radio Station, Palace of Labor, Solianka 12, Moscow, U. S. S. R., kindly advises us of their schedule of broadcasts. Their station, RV59, is on the air daily from 3 until 6 p. m., EST., announcing in nearly every European language, on the following days: Monday, German and English; Tuesday, Dutch, French and Hungarian; Wednesday, Czecho-Slovakian and English; Thursday, German, French and Spanish; Friday, German and English; Saturday, German, French and Spanish, and Sunday, German, English and Swedish. This station broadcasts the chimes from the Kremlin at 4 p. m., EST and has been heard recently by RA-DEX readers.

Reports of reception of RV59 have been received from Philip Robinson, Shelburne, N. S., W. T. R. Morris, and P. J. Soper, 256 Burroughs Terrace, Union, N. J. Mr. Soper writes, "Moscow, RV59, gives a fairly good signal in the afternoons near 4 o'clock. I picked them up at 3:55 p. m., yesterday and heard the English announcement, 'Hello, this is Moscow calling.' At 4 o'clock there were chimes, but not very distinct, and they played Internationale immediately following the chimes."

With completion of its new RCA transmitter at Wayne, N. J., station W2XE, the Columbia Broadcasting System's short wave unit in New York has returned to the air. Whereas the old transmitter operated on a wavelength of 49.02 meters, the new one will alternate between three different wavelengths each day. The waves used at 19.646 meters, 25.36 meters and 49.02 meters. This alternation of wavelengths has been arranged to give optimum results in transmission.

#### The Primary Class

For the benefit of those readers who are just commencing to tune the short waves we present again a list of the ten best stations of the month. This list does not include all the stations it is possible to hear, but only the ten broadcast stations which have been reported to us the greater number of times by our readers. It is possible to hear these stations at good speaker volume anywhere in the country and beginners should confine their efforts to this small group:

5.925, 50.60, HJ4ABE—Medellin, Colombia.

6.050, 49.56, GSA --- Daventry, England.

6.119, 49.00, YV1BC—Caracas, Venezuela.

6.618, 45.31, PRADO—Riobamba, Ecuador.

9.503, 31.55, VK3ME—Melbourne, Australia.

9.510, 31.53, GSB-Daventry, England.

9.862, 30.40, EAQ-Madrid, Spain.

11.711, 25.60-Pontoise, France.

11.753, 25.51, DJD-Zeesen, Germany.

11.800, 25.40, I2RO, Rome, Italy.

#### More "Info" from Sargent

As the result of an article by Clarence Sargent, 18 Clinton St., Dansville, N. Y., which appeared in RA-DEX, he has received numerous letters from readers asking for additional information. In answer to some of these questions, he writes, "I have increased my log considerably which now totals 1924 stations tuned in from 15 to 550 meters. Best DX is as follows: CMCI, X26A, XEW, G5SW, G2NM, FTN, PCJ, HVJ, IAC, ICGZ, PLE, LSG, LSY, LSR. HRB, PPU, PRBA. HKA. VK3ME, 2ME, VK3UZ, TI-4-NRH, HCJB, HC2JSB, OXY, DGB, OCJ, CT1AA, J1AA, SUZ and TGX. Receivers used are National AC45, National FB7 and a Lincoln. DX fans writing to foreign stations complain they do not get replies, in most cases they send U. S. A. stamps (which are no good to foreign stations) or they send nothing at all. If an International Reply Coupon is enclosed nine times out of ten they will receive a reply." The total of 1924 stations includes, of course, many amateurs. We have not named all the stations he mentions but only the best catches. Other questions he answers, such as identifying foreign stations, best time to tune, etc., have been acknowledged in RADEX.

#### Checks Them Twice

"I do not call a station received unless it has been checked up on two different days," writes F. L. Naylor, Jr., 176 Argyle Place, Arlington, N. "This is just a little code of eth-J. ics I have for myself. On the s. w. I have picked up these stations in GSE, GSD, GSC, GSA, England: GSB. I2RO comes in with volume equal to some local stations. EAQ has to be turned down. I have received my verification from CT1AA. Of course the Pontoise station comes in all over the dial on their different channels with no trouble. If anyone has a Stewart-Warner set with a built-in s. w. attachment I would like to hear from them and learn what they are getting on it."

"I wonder how many SW fans receive HBL Geneva, on 31 meters," asks W. T. R. Morris, Jr., 3219 Garland Ave., Richmond, Va. "It comes in here like a local. One of the other very loud stations is TI-4-NRH, and he sure comes pounding in here about 5 p. m. Some fans may have trouble identifying NRH. It sounds like "Tay-ee-quatrow-ennay-erray-ochay." I guess RADEX will have heard that VE9GW is back on the air and stronger than ever. By the way, I wonder how many fans got RV59 Moscow on the CBS hook-up. Well, CBS was my cue to try for him and sure enough there he was but pretty weak."

Harry W. Dugdale, 3103 Jackson St., San Francisco, Calif., uses a Philco Super Converter with a 9-tube Gilfillen super, and would like to hear from other users of these sets. Mr. Dugdale has heard 13 countries on S. W. and mentions that KA1XR, Manila, P. I., is back on the air. He is quite a successful broadcast band tuner, too, having heard nine stations in Japan.

#### Who is VUNK?

"The old faithfuls, I2RO, Pontoise and EAQ come roaring in," advises Richard M. Carter, 1315 Washtenaw "Following Ave., Ann Arbor, Mich. are a few of my new stations: GSA, GSD, RXC, PSH, ICEJ, DIQ, and DJD. Most of these come in with unusual volume, especially GSA at night. Here's one that has me wondering. I picked up a station that gave its call a great many times as VUNK, announced that it was on 40 meters or thereabouts and in a few minutes the operator played 'Play Fiddle Play' on a kazoo. It was com-ing in very, very loud." We wonder who VUNK might be. Can anyone identify this station?

#### More Queries

Two other stations on which no information is available have been received by readers. Geo. W. Burns, 2466 Wahl Terrace, Cincinnati, Ohio, asks which ship has the call sign VPSH, while K. P. Williamson, 1610 Sherbrooke St., W., Montreal, P. Q., heard a station on 2650 kc/s. near 7 p. m., giving marine weather reports and mentioning conditions off the Grand Banks.

Arthur C. Gluck, 295 Clinton Ave., Brooklyn, N. Y., writes, "For the fans who can listen on Sundays during the afternoon at about 1:30, EST. here is a tip. Whenever the National or the Columbia chains have scheduled a German re-broadcast, and there generally is one every Sunday at 2:00 p. m., tune in to DJD, 25.51 meters, or DIQ, 29.26 meters, or DJG, 29.6 meters. These are all powerful stations and can easily be tuned in on a good short wave set. Other Europeans that are easily picked up during the day are Pontoise, I2RO and London."

R. W. Evans, 832 Richie Ave., Lima, Ohio, has heard VK2ME and 3ME, DJD, 2RO, RXC, EAQ, YV1BC, Daventry, Pontoise, and many others on his Silver-Marshall 727SW receiver. He would like to hear from other owners of this set.

"I have a Majestic Model 204 called the Explorer on which I have picked up the following stations," writes Joe L. Burkholder, Box 434, Forest City, N. C., "Pontoise, 5SW, EAQ, Rome, LSX, Daventry, TI-4-NRH, YV1BC, HBP, DJD, CT1AA, HVJ, and VK3ME."

#### Finally Gets Foreigner

Last month we mentioned that Henry I. King, Jr., 743 Simpson St., N. W., Atlanta, Ga., had tuned on the short waves for nearly a year without having heard any foreign stations. At this time we are pleased to quote from several letters received from him since that time. "My big surprise came this A. M. at 6 to 6:45 on 9.5 megs. I got VK2ME, Sydney. The station came through very well in spite of severe man-made static. After a seven-day trial I finally pulled my hardest catch, TI-4-NRH. in Since 4:30 p. m., today it has been coming in like W1XAZ. I picked up GSA, 'A as in aerial,' and GSB, 'B as in broadcast,' and GSE, 'E as in Empire.' I also picked up a station on 11.8 megs. with a woman announcing 'Radio Roma-Napoli,' which came in good until W8XK came in drowning her out." Other stations he has heard are YV1BC, XAM, XDA and DJD.

(Continued on page 80)

# BUILDING UP the LOGS

So many readers ask us to mention that they would like to hear from other Radexers, it is impossible to repeat the request over and over. We are therefore trying the experiment of indicating with an asterisk the names of those who want to hear from others, particularly those having the same kind of set. We have had complaints in the past that some of those who had requested correspondence did not answer it. Even though those requesting letters may be flooded, nevertheless they are in duty bound to reply to the correspondence they have invited. Unless this is done, we will be unable to make such requests in future.

"I use a Scott DeLuxe," advises \*John Clarke, 387-14th St., Buffalo, N. Y. "I have had two Scott receivers and I think they are the berries. I have 430 stations since July including all states, except Delaware. I have 33 stations in California with 20 verified and five verifications expected. I have 40 stations in Canada, including all provinces; also 14 stations in Mexico, 11 in Cuba. I have verifications from WKAG and YV1BC. I have brought in 41 of the 96 channels in broad daylight. On the short waves I play France, Germany, Italy, Australia, with volume enough to be heard in any part of the house during summer months. I also get very good reception from Spain, Venezuela and other South American stations."

#### A Four-Tube Record

"I have logged 115 stations on 79 different frequencies in two and a half months, from November 7, 1932, to January 23, 1933," reports E. H. Swift, Eureka, Ill. "On the summary enclosed I have listed the stations according to the number in each state. Thirty-two states and Canada and Mexico are listed. You will note that

### • • Some DX Records

the most stations I have logged have been Illinois stations, but the second ranking state is California, with slightly more than half the number of Illinois stations. These ten stations from California are, among others, KFSD, KMPC, KTM and KFWI, all 500-watters according to the January RADEX. I do not have a big radio as may be suspected. My set was built by Western Radio Manufacturing Co., Chicago, named Westrad. It is a standard 4-tube set using a 47, 57, 58 and 80. I have experimented with aerials and grounds and find that the set works best when the aerial post of the set is grounded to either a pipe in the ground or a water pipe. That is the only connection excepting the 110 a. c."

#### The First Electric

"I have a Rogers 6-tube table model of the year 1932 (the makers of the first electric set in the world, a purely Canadian radio organization and the only one) so therefore we Canadians are sure proud that, like the telephone, a Canadian citizen, E. Rogers, was the first in radio (electrically)," proclaims Alex Williamson, 121 Campbell Ave., Hamilton, Ont.

"I have had a lot of good fortune in DXing this winter and I am proud to say I have logged 591 stations. I wonder if any of your readers could inform me when NAA, RUS, TGW, and TICR are on the air."

"I have been a DXer for eight years," says Harry A. Dugdale, 3103 Jackson St., San Francisco, Calif. "I have to date 437 long wave stations—seven countries, 48 states with nine stations in Japan alone. It is surprising how clearly and with what volume the latter come in. Australia also is received regularly along with KZRM, XER, HHK, CMCJ. I am using a Philco Super Converter on a nine-tube Super Gilfillen. I would like to join some of the DX clubs and would like to have them write me about it."

"My machine is a five-tube, electric table model, made by the Northern Electric Company," remarks G. Campbell, 555 Newport Ave., Oak Bay, Victoria, B. C. "The reception of all stations has been on the loud-I have received KGBU, speaker. KGU, KGMB, and the following Japs: JOAK, on two frequencies, JOIK, JOFK, JOCK, JOBK, JOHK, JOJK, JFAK, JOGK, also XGOA. While from down under I have the follow-1YA, 2YA, 2CO, 3AR, 5CK, ing: 4QG, 3LO, 2BL, 4RK, 2UE, 4BC, 2FC, 2GB, 7ZL, and two unidentified ones which I think are 2UW and 3HA."

#### It's in the Blood

"I've done no DX work for years, as hammering a key professionally was enough radio for me," admits A. C. Spear, 1825 Hamlin St. N. E., Washington, D. C. "I have no key to pound on now so, like all of my ilk, it was in the blood and soon came out. Have an old model 87L Philco that the 'Mrs.' uses for her entertainment, and thought I'd fix it up. Had to string an antenna up and line up the condenser gang, get some new tubes, but I've been well repaid for So far I've logged 188 my work. stations in 38 states and that's only the beginning."

"The fall and winter surely have been fine for DXing," remarks Stanley H. Bond, Keyser, W. Va. "I have been able to log 63 new stations since October 1st; also completing my log of states with the addition of Wyoming and Vermont. My list now stands at 571 stations in North America, all verified. No trans-Atlantic or trans-Pacific stations appear on my list, as I have not been fortunate enough to pull them in. I use a model 70 Atwater Kent receiver."

#### Makes a Test

"Just for the sake of finding out what my receiver (a Philco 8-tube

Model 87, which is now over three years old) would do under adverse radio conditions," writes C. H. Osborn, 17 No. Fifth St., Fulton, N. Y., "I started keeping a log of stations received, six weeks ago. To make the test more difficult, I listened for stations only from 6:00 to 9:00 P. M. each evening. In this location there is considerable power-line interference, and other equally aggravating noise and interference between those hours. I am enclosing a list of stations received and identified, during the six weeks' period. There is no unusual distance, but I had many of these stations at will, any night I desired to bring them in. KFI comes in with fair volume at 10:00 P. M., EST. This is a total of 121 stations brought in with good volume on the loudspeaker in a six weeks' test. I give full credit to RADEX. It's a great little pal."

"I have been DXing for four months and have 125 stations, with verifications," says \*Don Harkness. 64 Queen St., St. Catharines, Ont. "On Sunday morning, January 8th, I was lucky enough to pick up JOIK. Sapporo, Japan, between 4:00 and 5:00 A. M., EST. Some of my best catches are JOIK, Sapporo, Japan, a 10,000-watter; CMJK, Camaguey. Cuba, a 300-watter; CMCJ, Havana, 250 watts; HJN, Bogota, Colombia, 3500 watts; WKAQ, San Juan, Porto Rico, 1000 watts. I have a Stewart-Warner 7-tube A.C."

#### Arizona Gets Alaska

"I have been a DX hound for six years," admits \*Claude Manship, Kingman, Ariz. "I never stay up any later than 10:30 P. M., and I feel that I have achieved a great amount of distance during this time. My best catch is VAS at Glace Bay, N. S. I have also received KGBU, Ketchikan, Alaska, and WKAW at Porto Rico. My set is an Atwater Kent 55, with an antenna 122 feet long, 36 feet high. I have my set grounded on a steam radiator in the house with no outside ground, and it has proved to be the best ground that I have experimented with."

"I have a four-tube battery set (made by my son-in-law)," says Henry P. Burt, 355 Union St., New Bedford. Mass. "I do not know the kind, but I have logged 227 stations, including Mexico. Cuba and Canada. My prize one, however, is KZRM, Manila, P. I., but I have only been able to get it once. I wish the Mexican stations would announce in English, as well as Spanish, as it is very hard to place them and I would not have been able to get as many as I have without the aid of RADEX. I have 16 in Mexico, 14 in Cuba, and 31 in Canada."

#### Good List from Nova Scotia

"RADEX was responsible for my verification of YV1BC, Caracas, Venezuela," says P. H. Robinson, Box 8, Shelburne, N. S. "Some of my best catches are HJN, Bogota; WKAQ, San Juan; XES, Tampico; and KTM, KNX, KFI, KPOW, KGO, KFOX, KFVD (250 watts), KHJ, KFSD, all in California. I also am interested in short waves having logged GSA, GSB, etc., I2RO, FYA, VE9JR, VE9DR, Moscow on about 45.35 meters, and quite a number in the U. S. Most of these are verified."

"This winter so far has proved a fairly good DX season," says Charles Meyer, Jr., 411 Blake St., St. Joseph, Mo., "and I am well on my way to my three hundredth station. I have now received 285 stations and average about five new ones each night I sit up, which isn't very often. I haven't been able to get across the ocean yet, but considering the fact that I do not use an aerial I don't think this is so bad."

"At present I have a log of 210 stations with 43 verified and about 20 or 25 letters out for verifications," advises \*John J. Barlow, 2803 Woolsey St., Berkeley, Calif. "My set is a Philco 90 and I have had it just a little over a year. Included in my log are three Australian stations, one New Zealand, 11 Japanese, one Alaskan, 11 Canadian, 8 Mexican, one Cuban, and one Porto Rican. All the rest are from 37 states in the U. S. I consider my best catches 10-AT, JOSK, JODK, WBIG, WKAQ, CMK and XETA. My best verifications to date include 2CO, 2YA, KGNO and WRUF."

"To date I have received 411 stations (no two alike)," reports Frank Wheeler, 406 Eagle Point, Lakeside, Erie. Pa. "I have a 9-tube Silvertone. I did have a 6-tube Silvertone and with it I received 375 stations. and since getting the 9-tube set I have increased this number to 411. I keep a separate log for my 9-tube set, which I bought in September. 1932. From then until now I have received 196 stations. I think this is pretty good, as I only stay up, to do my DXing, from 1:45 to 5:00 A. M. each Sunday morning. If I receive a station on the 9-tube that I did not receive on the 6-tube set I add it to . my main log."

"I have a Northern Electric converter, and it sure is one snappy job for pulling in European stations," reports Dudley Clarke, 1962 Tupper St., Montreal, Que. "My shortwave log (including 'hams') from February 2nd to March 8th is 256. Among my best stations are: EAQ, IZRO, GSA, GSC, Radio Colonial at Pontoise; YVQ, HBP, GSB, GBB, DJC, DJD, YV1BC, HJB, LSN and HC1FG, a 'ham' in Ecuador. Have heard WOO working ships but have no ships in my log as yet."

#### On a Home-Made Set

"I have a homemade two-tube set on which I have received 380 stations," comments Dick Stubbs, Okanagan Mission, Kelowna, B. C. "The best are WGLC and WGNY, 50-watters in New York State. Also I have YV1BC, WNBX, WCAZ, WDZ, WAZL, WHOM, WEXL, WTAR and CKPC. From across the Pacific I have 3LO, 4QG, 2YA, 2BL and have had as many as 17 Japs in one night. 4QG comes in nearly every night

(Continued on page 72)

# TUNING a RADIO in BRITAIN

**F** OR the full enjoyment of European broadcasting a very selective receiver is essential. The separation between stations is only nine kc/s. The writer finds the Superheterodyne type the most successful. Over 150 stations have been identified. These results have been obtained in Lincolnshire, which county is admirably located for European listening.

Conditions are ideal at present for long distance reception. In fact, they are better now than they have been for several years. Many of the usually weak stations are coming in at fine volume.

#### The Daylight Stations

In daylight sixteen stations are available at excellent strength. They are, in order of merit, long-waves (150 to 300 kc/s) Daventry National, Kalundborg, Radio-Paris, Eiffel Tower, Huizen, Warsaw and Königs Wusterhausen; medium waves (550 to 1,-500 kc/s) London Regional, North Regional, North National, Brussels No. 1, Breslau & Heilsberg. Other good stations, but at less intensity are Brussels No. 2, Langenberg, Poste Parisien, Hamburg and Scottish Regional. The latter two are about equal in volume. The new I. F. S. station at Athlone using 80 kw. is good at all hours.

After sunset the above list is considerably augmented. On the higher waveband, foreign reception is excel-Warsaw heads the list, both lent. for quality and strength. Kalundborg is a good second. When not troubled by heterodynes from Russian transmitters, Oslo is excellent. Leningrad is a fine signal. Moscow's stations. Old Komintern and Trades Union are both good. Motala has been poor for some time, but is improving. Kaunas is weak.

### • • $B_{\gamma}$ PERCY DODSON\*

On the medium waveband, the German stations practically rule the waves. Breslau deserves special mention, for it comes over at tremendous strength. Heilsberg, Mühlacker, Hamburg, Frankfurt, Langenberg, Leipzig and Gleiwitz come through like "locals." Italy is a close rival with Trieste, Florence, Milan and Turin. Rome is not so good. It seems to have fallen off a little. The best French representatives are Poste Parisien. Strasbourg, Fécamp and Toulouse. Fécamp, owing to its rather low wave, suffers badly from fading. Of the Swedish stations, Stockholm. Hörby and Göteborg are the The Czechs, Prague, Brno and best. Moravska-Ostrava are well received. Sottens and Beromünster are very reliable. Barcelona EAJ.1 is the best in the Spanish group. Good reception has been obtained from Ljubljana, Budapest, Vienna, Katowice, Bucharest. Lwow, Algiers and Graz.

Fécamp and Toulouse give sponsored programs nightly for the benefit of British listeners. Radio-Paris does likewise on Sundays. Another station soon to be added to these is Luxembourg. It will be the most powerful transmitter in the world. It is, at present, testing, and is received at great volume. The aerial power is 200 kw.

#### Power is Increasing

More and more power seems to be the motto of European broadcasters. Every available channel will soon be occupied by a station with a power rating of from 25 to 120 kw.

The American medium-wave stations have been prominent this year. Some two dozen have definitely been identified. The most consistent are WHAM, WTIC, WENR, WPG, WCAU and WIOD. The latter is (Continued on page 72)

[34]

## WHAT'S ON THE AIR TONIGHT?

Fill in calls and dial numbers for those stations through which you best receive the three chains. You can then turn quickly to the one that has the feature you want.

COLUMBIA (C).......WABC NATIONAL, Red (R)......WEAF NATIONAL, Blue (B).......WJZ

Call	Dial	Call	Dial	Call	Dial	Call	Dial	Call	DiaI	Call	Dial
							·				

TIME: ED Eastern Daylight; E Eastern; C Central; M Mountain.

For Pacific Time subtract one hour from Mountain.

RADEX is the only publication listing stations in alphabetical order for your convenience. While these programs are correct at the time of going to press changes are made from time to time. Due to change to Daylight Saving Time on April 30th, some of the stations listed will be unable to carry particular features.

#### MONDAY

ED-5:45 p.m., E-4:45, C-3:45, M-2:45 B — Little Orphan Annie CKGW KDKA WBAL WBZA WCKY WGAR WHAM WIS WJAX WJR WJZ WRVA WWNC

ED-6:00 p.m., E-5:00, C-4:00, M-3:00 R - Waldorf-Astoria Órchestra CKGW KFYR KGO KOA KPRC KSD KTBS WBEN WCAE WCKY WCSH WDAF WEAF WENR WFBR WFI WHO WIBA WIOD WJAR WKY WMC WOAI WOC WRC WSB WSMB WTAG WWNC

C - Reis and Dunn C — Reis and Dunn CFRB CKOK KFAB KFH KLZ KMBC KSCJ KSL KTRH KVOR WAAB WADC WBCM WBIG WBRC WBT WCAO WDAE WDBO WDOD WDSU WEAN WFAN WGR WHEC WIP WISN WJAS WJSV WKBH WLBW WLBZ WNAX WOKO WORC WQAM WSBT WSFA WSJS WSPD WTAQ WTAR WTOC

ED-6:30 p.m., E-5:30, C-4:30, M-3:30 C — Jack Dempsey's Gymnasium CFRB WABC WCAO WHK WCAU WKBW WKRC

R— Richard Himber's Ensemble KFYR KGO KGW KHQ KOA KOMO KPRC KSD KTBS KTHS KVOO WDAF WEAF WFBR WIBA WIS WMAQ WMC WOAI WSB WSMB B — Three X Sisters KSO KWCR KWK WBAL WJZ WREN WSYR

ED-8:45 p.m., E-5:45, C-4:45, M-3:45 R — Countess Olga Albani KFSD KGO KGW KOMO WBEN WCAE WEAF WFBR WHO WIS WJAR WJAX WMAQ WMC WOC WUYYO WRC WSAI WSB WSM WTAG WWNC

- Just Plain Bill CKOK WAAB WABC WCAO WCAU WHK WJSV WKBW

B -- Lowell Thomas CKGW KDKA WBAL WBZ WBZA WGAR WHAM WJR WJZ WLW - Little Orphan Annie KFYR KOIL KPRC KSO KSTP KTBS KWCR KWK WBAP WDAY WEBC WENR WKY WOAI WREN

ED-7:00 p.m., E-6:00, C-5:00, M-4:00 R — Walberg Brown Concert KSTP WCSH WEAF WFBR WIBA WRC WSAI WTAM

- Myrt and Marge CKOK KRLD WABC WADC WCAO

WCAU WDRC WEAN WFBL WGR WHK WJAS WJSV WKRC WNAC WOKO WSBT WSPD WWVA B — Amos'n' Andy CKGW KDKA WBAL WBZ WBZA WCKY WFLA WGAR WHAM WIOD WJAX WJR WJZ WLW WPTF WRC

WRVA WWNC

ED-7:15 p.m., E-6:15, C-5:15, M-4:15 B — Octavus Roy Cohen Mystery KDKA KOIL KSO KWCR KWK KYW WBAL WBZ WBZA WCKY WENR WJR WJZ WLS WLW WREN

C—Buck Roger—Year 2433 CKOK KMOX WABC WBBM WCAU WCCO WGR WHAS WHK

ED-7:30 p.m., E-6:30, C:5:30, M-4:30 B — Five Star Theatre KDKA KTBS WBAL WBZ WBZA WHAM WIS WJZ WMAL WMC WPTF WRVA WSAZ WSMB WWNC C --- Doiph Martin's Orchestra WABC WCAO WCAU WDRC WEAN WFBL WFEA WGR WHEC WHP WJAS WJSV WLBZ WNAC WOKO WORC

WCKY WCSH WDAF WEAF WEEI WENR WFBR WGY WJAR WSAI

WTAG

ED-7:45 p.m., E-6:45, C-5:45, M-4:45 R — The Goldbergs KFYR KPRC WBEN WCAE WCSH WDAF WEAF WEEI WENR WFAA WFBR WGY WJAR WKY WLIT WOAI WOW WRC WSAI WTAG WTAM WTMJ WWJ C — Boake Carter, News Flashes CKOK KMBC KMOX WABC WBBM WBT WCAO WCAU WCCO WGR WHAS WHK WJSV WNAC ED-8:00 p.m., E-7:00, C-6:00, M-5:00 C – Singin' Sam CKOK KMBC KMOX WABC WADC WCAO WCAU WDRC WEAN WFBL WFBM WGN WGR WHK WJAS WJSV WKRC WNAC WOKO WSPD WBEN WCSH WEAF WEEI WGY WJAR WTAG WTIC

B - Clicquot Club Eskimos KDKA KOIL KSO KWCR KWK WBAL WBZ WBZA WCKY WGAR WHAM WJZ WLS WREN

ED-8:15 p.m., E-7:15, C-6:15, M-5:15 C — Manhattan Serenaders CFRB CKOK KFH KLRA KLZ KMBC KRLD KSCJ KSL KTSA KVOR WABC WADC WBIG WCAH WCAU WDAE WDBJ WDBO WDOD WDRC WDSU WEAN WFPL WFBM WFEA WGR WGST WHK WHP WIBW WISN WJAS WLAC WLBW WLBZ WNAC WNAX WNOX WOKO WORC WQAM WREC WSFA WSJS WSPD WTAQ WTOC

ED.8:30 p.m., E-7:30, C-6:30, M-5:30 C — Fu Manchu Mystery CFRB CKOK KMBC KMOX KRLD WABC WADC WBT WCAO WCAU WDRC WEAN WFBM WGN WGR WHAS WHK WJAS WJSV WKRC WNAC WOKO WOWO WSPD

ED-8:45 p.m., E-7:45, C-6:45, M-5:45 R — Famous Brands—Ranny Weeks WBEN WCAE WCSH WDAF WEAF WEEI WGY WJAR WLIT WLW WMAQ WRC WTAG WTAM WTIC WWJ

B — Phil Cook-Andy Sanella KDKA KOIL KSO KWCR KWK WBAL WBZ WBZA WCKY WGAR WIAX WJR WJZ WLS WMAL WREN WSYR

WS1R ED-9:00 p.m., E-8:00, C-7:00, M-6:00 C — Grand Opera Miniatures CFRB CKOK KFH KLRA KLZ KMBC KRLD KSCJ KSL KTSA KVOR WABC WDBJ WDBO WDOD WCC WDSU WEAN WFBL WFBM WGST WHEC WINK WHP WIBW WLCC WISN WJAS WJSV WKBW WLCC WJSN WLBZ WMBD WNAC WAAX WNOX WOKO WORC WFG WQAM WREC WJSS WSFD WTOC  $\mathbf{R} - \mathbf{A} \cdot \mathbf{S} + \mathbf{G} \mathbf{G} \mathbf{G} \mathbf{G} \mathbf{G}$ WEAK WCAE WCAE WCSH WDAF WEAF WEEI WGY WHO WJAF WEAF WEEI WGY WHO WJAF WLIT WMAQ WOC WOC WWC WSAI WTAG WTAM WTIC WWJ  $\mathbf{B} - \mathbf{Sinclair Minstreis}$ B — Sinclair ministress KDKA KFYR KOIL KPRC KSO KSTP KTBS KTHS KVOO KWCR KWK WAPI WBAL WBZ WBZA WDAY WEBC WFAA WFLA WGAR WHAM WIBA WIOD WIS WJAX WJDX WJR WJZ WKY WLW WMC WOAI WREN WRVA WSB WSM WSMB WTMJ WWNC

ED-9:30 p.m., E-8:30, C-7:30, M-6:30 C – Evening in Paris CKOK KLZ KMBC KMOX KOMA KSL WABC WCAU WCCU WDSU WEAN WGN WGST WHK WJAS WJSV WNAC B — Jack Frost's Melody Moments KDKA WBAL WENR WGAR WHAM

WJR WJZ WLW

#### MONDAY—(Continued)

ED-10:00 p.m., E-9:00, C-8:00, M-7:00 C — Golden Country Club WAAB WABC WCAO WCAU WDRC WFBL WHEC WHAP WICC WJAS WJSV WKBW WLBW WOKO WPG R — Contented Program CFCF CKGW KFYR KPRC KSD CFCF

KSTP WBEN WCAE WDAF WEAF WEBC WENR WFAA WFLA WGY WHO WIOD WJAX WKY WMC WOAI WOC WRVA WSAI WSB WSM WTAM WTMJ WWJ

ED-10:30 p.m., E-9:30, C-8:30, M-7:30 C — Edwin C. Hill

C — Edwin C. HIII CFRB CKOK KI.RA KLZ KMBC KMOX KSCJ KTRH KTSA KVOR WAAB WABC WADC WBCM WBIG WBRC WBT WCAH WCAO WCCO WDAE WDBJ WDOD WDRC WDSU WFAN WFBL WFBM WFEA WGST WHAS WHEC WHP WIS WIAS WLBW WHEC WHP WISN WLBW WLBZ WMBD WNAX WNOX WODX WOKO WORC WCAM WRCC WSJS WSPD WTOC WSJS WSPD WTOC

#### - National Radio Forum

H — National Radio Forum KECA KGA KPO KSD KTAR KTBS WBEN WCSH WDAF WEAF WEEI WENR WFBR WFLA WIBA WIOD WIS WJAR WJDX WKY WOAI WIC WILVA WSAI WTAG WTAM WWJ WWNC

ED-10:45 p.m., E-9:45, C-8:45, M-7:45 C — William O'Neal Tenor CFRB CKOK WAAB WABC WADC WCAU WDRC WEAN WFBL WFEA WHEC WIK WICC WJAS WJSV WKBN WKBW WLBW WLBZ WOKO

WORC WER WEBW WEBW WEBZ WORO WORC WPG WSPD C — Myrt and Marge KDB KERN KFBK KFPY KFRC KGB KHJ KLZ KMBC KMJ KMOX KOIN KOL KSL KVI KWG WBBM WCCO WDSU WFBM WHAS WLAC

ED-11:00 p.m., E-10:00, C-9:00, M-8:00 B — Southern Singers

WBAL WFLA WHAM WIOD WIS WJZ WWNC

WIZ WWNC C = Howard Barlow's SymphonyCFRB CKOK KFAB KFH KLZKMBC KSCJ KSL KTRII KVORWAAB WABC WADC WBCM WBRCWBAN WABC WADD WDRC WDSUWEAN WFAN WFPM WHK WIBWWICC WIP WISN WJAS WJSDWKBN WKBW WLBW WLAS WJSDWKBN WKBW WLBW WLAS WMBDWNAX WODX WOKO WORC WQAMWSBT WSJS WSPD WTAR WTOC<math>B = Amos'n' AndyKDYL KFI KFSD KGO KGW KHQKOA KOLL KOMO KPRC KSTP

KOA KOIL KOMO KPRC KSTP KTHS KWK WBAP WDAF WENR WJDX WKY WMAQ WMC WOAI WREN WSB WSM WTMJ

ED-11:15 p.m., E-10:15, C-9:15, M-8:15 B — Octavus Ray Cohen Mystery KDYL KFI KFYR KGA KGO KGW KOA KOIL KOMO KPRC KSO KSTP KTHS KWCR KWK KYW WBAP WDAY WERC WIBA WJDX WMC WOAI WREN WSB WSMB

ED-11:30 p.m., E-10:30 C-9:30, M-8:30 C — Ted Lewis and Orchestra CFRB CKOK KFAB KFH KLRA KLZ KMBC KMOX KSCJ KSL KTRH KVOR WAAB WABC WACO WADC WCAH WCAO WCAU WCCO WDAE WDBJ WDBO WDOD WDRC WDSU WEAN WFBL WFBM WGST WHEC WHP WIBW WICC WJSV WKBN WKBW WLAC WLBW WLBZ WMBD WMT WNAX WNOX WOKO WORC WPG WQAM WREC WSBT WSJS WFBUD WEGG WSPD WTOC

B — Phantom Gypsy CFCF KFYR KPRC KSO KSTP KTBS KTHS KWCR KWK WBAL WBAP WCKY WDAY WEBC WENR WGAR WHAM WIBA WJZ WKY WMAL WMC WOAI WREN WSB WSMB WSYR

R — Jack Denny and Orchestra WEAF WFBR WJAR WRC WTAG WTIC

ED-12:00 p.m. E-11:00, C-10:00, M-9:00 C - Leon Belasco and Orchestra

C - LEON BELASCO AND UTCHESSICA CKOK KFAB KLAR KLZ KMBC KRLD KSCJ KTRH KVOR WABC WACO WCAH WCAO WCAU WCCO WDOD WDSU WEAN WFBL WGST WHP WIBW WICC WISN WAS WHY WIDW WICC WISN WAS WHP WIBW WICC WISN WJAS WJSV WKBW WLAC WLBW WMBD WMT WNAC WNAX WNOX WOKO WREC WSBT WSPD WTOC

#### TUESDAY

ED-5:45 p.m., E-4:45, C-3:45, M-2:45 B — Orphan Annie See Monday

ED-6:00 p.m., E-5:00, C-4:00, M-3:00 C — Reis and Dunn See Monday R - Waldorf-Astoria, See Monday

ED-6:15 p.m., E-5:15, C-4:15, M-3:15

C - Betty Barthell CFRB CKOK WAAB WABC WACO WADC WBBM WBIG WCAO WDAE WDBJ WDBO WDDO WDRC WDSU WFFA WGST WHEC WHP WJAS WHCY WHO WTBY WJAY WJSV WLAC WLBW WLBZ WNOX WOKO WORC WQAM WREC WSFA WSJS WSPD WTOC

# ED-6:30 p.m., E-5:30, C-4:30, M-3:30 C - Jack Dempsey, See Monday

G → Jack Dempsey, See Woodday R → Mid-Week Hymn Sing KFYR KGO KOA KOMO KTBS KTHS KVOO WBEN WDAF WEAF WFBR WFI WIS WMAQ WMC WOAI WPTE WSB WSMB WTAG WWNC

ED-6:45 p.m., E-5:45, C-4:45, M-3:45 R — James Melton, Tenor KOA WEAF WFBR WFI WHO WIS WJAR WMAQ WOC WOW WRC WSAI WSM WTAG

B — Lowell Thomas, See Monday
 B — Orphan Annie, See Monday
 C — Just Plain Bill, See Monday

ED-7:00 p.m., E-6:00, C-5:00, M-4:00 R — Walberg Brown, See Monday C — Myrt and Marge, See Monday B — Amos 'n' Andy, See Monday

ED-7:15 p.m., E-6:15, C-5:15, M-4:15 C — Buck Rogers, See Monday B — Radio in Education

B — Madio in Education KDKA KDYL KECA KEX KFSD KFYR KGA KGIR KJR KOA KOIL KPO KTBS KVOO KWCR WBZ WBZA WENR WFLA WIBA WIS WJDX WJZ WMC WOAI WPTF WREN WSB WSM WSMB WWNC

ED-7:30 p.m., E-6:30, C-5:30, M-4:30 C — Keller, Sargent and Ross CKOK KMBC KMOX WABC WCAO

[36]

WCAU WDRC WGN WGR WHAS WHK WJAS WJSV WKRC WNAC

ED-7:45 p.m., E-6:45, C-5:45, M-4:45 C - Boake Carter, See Monday R - The Goldbergs, See Monday

ED-8:00 p.m., E-7:00, C-6:00, M-5:00 C — Musical Album C — Musical Album CFRB CKOK KFH KLRA KLZ KMBC KSCJ KSL KTRH KTSA KVOR WABC WADC WBIG WCAH WCAO WCAU WCCO WDAE WDBJ WDBO WDOD WDRC WDSU WEAN WFBL WFBM WFEA WGR WGST WHAS WHEC WHEA WGR WLBZ WMBG WNAC WNOX WOKO WPG WQAM WREC WSFA WSJS WSPD WTAQ WTAR WTOC WWVA  $\mathbf{R}$  — Blackstone, Sanderson-Crumit

WTAQ WIAK WICC WWYA R - Blackstone, Sanderson-Grumit KSD KSTP KYW WBEN WCAE WCSH WDAF WEAF WEBC WEEI WFI WGY WHO WJAR WOC WOW WRC WSAI WTAG WTAM WWJ B - Eno Crime Club

KDKA KOIL KSO KWCR KWK WBAL WBZ WBZA WGAR WHAM WJZ WLW WMAQ WREN

ED-8:15 p.m., E-7:15, C-6:15, M-5:15

C - Magic Voice C KOK KMBC KMOX WABC WADC WCAO WCAU WDRC WEAN WFBL WFBM WGN WGR WHAS WILK WJAS WJSV WKRC WNAC WOKO WSPD

ED-8:30 p.m., E-7:30, C-6:30, M-5:30 C — Kate Smith CKOK KMBC KMOX WABC WADC WBCM WCAH WCAO WCAU WCCO WBCM WCAH WCAO WCAU WCCO WFBL WFBM WGN WGR WHAS WHEC WHK WISN WJAS WJSY WKBH WKRC WOKO WOWO WSPD

WADH WARC WORO WOWO WSDY R - Wayne King and Orchestra KSD KSTP WBEN WCAE WCKY WCSH WEAF WEBC WEEI WFBR WFI WGY WHO WIBA WJAR WTAG WTAM WTMJ WWJ B Haeik H-th. T-th - Horlick-Health Talks

KDKA KOIL KWCR KWK WBAL WBZ WBZA WGAR WHAM WJZ WLS WLW WREN

ED-8:45 p.m., E-7:45, C-6:45, M-5:45 ED-8:45 p.m., E...., B — Southern Singers KDKA KDYL KFSD KOA KOIL KTBS

B — Southern Singlers KDKA KDYL KFSD KOA KOIL KPO KPRC KSO KTAR KTBS KVOO KWCR KWK WBAL WBAP WBZ WCKY WFLA WGAR WHAM WIS WJDX WJR WIZ WKY WLS WMAL WMC WOAI WREN WSB WSM WSMB WSYR WWNC

NSM WSMB WSHA WWW C – Abe Lyman and Orchestra CKOK KMBC KMOX WABC WADC WCAO WCAU WDRC WEAN WFBL WFBM WGN WGR WHAS WHK WJAS WJSV WKRC WNAC WOKO WOWO WSPD

ED-9:00 p.m., E-8:00, C-7:00, M-6:00

ED-STOU D.M., E-STOU, C-(TOU, W-STOU C  $\sim$  Easy Aces CKOK KMBC KMOX WABC WADC WCAO WCAU WCCO WDRC WEAN WFBL WFBM WGN WGR WHAS WHK WJAS WJSV WKRC WNAC WOKO WSPD

Ben Bernie and Orchestra

**H** — Ben bernie and orchestra KFYR KOA KPRC KSTP WBAP WBEN WCAE WCKY WCSH WDAF WDAY WEAF WEEI WFBR WF1 WCY WHO MIAD WEY WHO WGY WHO WJAR WKY WLS WMC

#### TUESDAY—(Continued)

WOAI WOC WOW WRC WRVA WSAI WSB WSM WSMB WTAG WTAM WWJ

B — Household Musical Memories KDKA KSO KWK WBAL WBZ WBZA WHAM WJR WJZ WMAQ WBZ WREN

ED-9:15 p.m., E-8:15, C-7:15, M-6:15 Threads of Happiness C — Threads of Happiness CKOK KDB KERN KFBK KFH KFPY KFRC KGB KHJ KLRA KLZ KMBC KMJ KMOX KOIN KOMA KRLD KSL KTRH KTSA KVI KWG WABC WADC WBRC WBT WCAO WCAU WCCO WDAE WDRO WDOO WDRC WCSU WEAN WFBL WFBM WGN WGST WHAS WHEC WHA WJAS WJSY WKBW WKRC WLAC WNAC WOKO WOWO WQAM WREC WSPD WTAR WTOC C

ED-9:30 p.m., E-8:30, C-7:30, M-6:30 R — Ed Wynn-Don Voorhees CFCF KDYL KFI KFSD KFYR R — Ed Wynn-Don Voorhees CFCF KDYL KFI KFSD KFYR KGHL KGIR KGO KGW KHQ KOA KOMO KPRC KSD KSTP KTAR KTBS KTHS KVOO WBAP WBEN WCAE WCSH WDAF WDAF WDAY WEAF WEBC WEEI WFBR WFI WFLA WEBG WEEI WFBK WFI WFLA WGY WHO WIBA WIOD WIS WJAR WJAX WJDX WKY WLW WMAQ WMAC WOAI WOC WOW WRC WRVA WSB WSM WSMB WTAG WTAM WTMJ WWJ WWNC C — California Melodies

C -- California Melodies CFRB CKOK KFH KLZ KMBC KMOX KSCJ KSL KTRH KTSA WABC WBCM WBIG WBRC WBT WCAO WCAU WCCO WDAE WDOD WDRC WEAN WFBM WFEA WHEC WHK WIBW WJAS WKEA WHEO WLBW WHBZ WMBD WNAC WNAX WODX WOKO WQAM WSJS WTAR WTOC

B — Willard Robison and Orchestra KDKA KSO KWK WBAL WBZ WBZA WCKY WENR WJR WJZ WBZA WCKY WREN WSYR

ED-10:00 p.m., E-9:00, C-8:00, M-7:00

ED-10:00 p.m., E-9:00, C-8:00, M-7:00 R — Walter Damrosch Symphony KOA WBAP WBEN WCAE WDAF WEAF WEBC WEEI WENR WJAX WRVA WATAM WWJ C — Five Star Theatre KLRA WABC WBIG WBT WCAO WCAU WDBJ WDDD WDRC WDSU WEAN WFBL WFEA WHP WICC WJAS WJSV WKBW WLAC WMBG WMAC WNOX WOBU WOKO WORC WIEC WSJS WTAR R — Signund Spacific Tune Detective

B — Sigmund Spach, Tune Detective CFCF KDKA KOIL KSO KWCR KWK WBAL WCKY WGAR WHAM WJR WJZ WMAQ WREN WSYR

ED-10:15 p.m., E-9:15, C-8:15, M-7:15 B — Vic and Sade

CFCF KDKA KOIL KSO KWCR KWK KYW WBAL WCKY WGAR WJR WJZ WREN WSYR

ED-10:30 p.m., E-9:30, C-8:30, M-7:30 B — Mary Steele, Contralto CKGW KDKA KSO KWCR WBAL WCKY WGAR WHAM WJR WJZ WMAQ WREN WSYR C - Edwin C. Hill, See Monday

ED-10:45 p.m., E-9:45, C-8:45, M-7:45 C — Charles Carlile, Tenor CFRB CKOK KFAB WAAB WABC

WADC WBCM WDRC WFAN WFBL WFEA WHEC WHK WIP WJAS WJSV WKBN WKBW WLBZ WOKO WORC WFG WSBT WSPD C — Myrt and Marge, See Monday

ED-11:00 p.m., E-10:00, C-9:00, M-8:00 R - Southernaires Male Quartet CKGW KSD WCAE WCKY WCSH WEAF WFBR WHO WOC WRC

WSAI WWJ B — Joe Green's Marimba Band

WBAL WHAM WIS WJAX WJZ WSYR WWNC

C — Howard Barlow, See Monday B — Amos 'n' Andy, See Monday

ED-11:15 p.m., E-10:15, C-9:15, M-8:15 B - Heart Songs, Women's Octet B - Heart Songs, Women's Utiet CFCF CKGW KFYR KGIR KPRC KSTP KTBS KWK WBAL WCKY WENR WFLA WGAR WHAM WIBA WIS WJR WJZ WAC WRC WRC WREN WSM WSYR WWNC

ED-11:30 p.m., E-10:30, C-9:30, M-8:30 C — Abe Lyman and Orchestra GFRB CKOK KFAB KFH KLRA KLZ KMBC KSCJ KSL KTRH KVOR WAAB WABC WACO WADC WCAH WCAO WCAU WCCO WDAE WDBJ WDBO WDOD WDRC WDSU WEAN WFBL WFBM WGST WHK WHP WIBW WICC WISN WJSV WKBN WKBW WLAC WLBW WLBZ WMBD WMT WNAX WNOX WOKO WORC WPG WQAM WIREC WSBT WSJS WSPD WTOC WWVA R — Talkie Picture Time, Drama

WSJS WSFD WHOC WWYA R — Talkie Picture Time, Drama KPRC KSD KTBS KTHS WBEN WCAE WCSH WDAF WEAF WEEI WFAA WFBR WFI WHO WJAR WKY WMAQ WOAI WOC WOW WRC WSAI WTAG WTAM WWJ B — Phantom Gypsy, See Monday

#### ED-12:00 p.m., E-11:00, C-10:00, M-9:00 - Joe Haymes and Orchestra C -

C - Joe Haymes and Orenestra CKOK KFAB KLZ KMBC KSCJ KSL KTRH KVOR WABC WBRC WBT WCAH WCAU WDAE WDOD WDSU WFBL WGST WHAS WHK WHP WISN WJAS WJSV WKBW WLBW WMBD WMT WNAX WNOX WOKO WPG WREC WSBT WSPD WTOC

ED-12:30 a.m., E-11:30, C-10:30, M-9:30 R — Sam Robbins and Orchestra

WAPI WCAE WEAF WFBR WFI WFLA WIOD WJAR WMAQ WMC WRC WSB WSM WSMB WTAM WWNC

R --- Ben Bernie and Orchestra KFI KFSD KGO KHQ KOMO KSD KTAR

R ..... Mark Fisher and Orchestra KOIL KPRC KSO KSTP KTBS KWCR KWK WDAY WEBC WENR WFAA WGAR WIBA WJR WJR WKY WLW WOAI WREN WTMJ

#### WEDNESDAY

ED-5:45 p.m., E-4:45, C-3:45, M-2:45 B - Orphan Annie, See Monday

ED-6:00 p.m., E-5:00, C-4:00, M-3:00 C. Dick Mansfield and Orchestra

C – Dick Mansheid and Urchestra CFRB CKOK KFH KLZ KSCJ KSL KVOR WAAB WABC WACO WBIG WBRC WDAE WDBJ WDBO WDOD WDRC WDSU WYEA WGST WHAS WHEC WHP WISN WKBH WKBN WLBW WLBZ WMT WNAX WNOX

[37]

WODX WOKO WORC WQAM WREC WSBT WSFA WSJS WSPD WTAQ WTOC

B-Waldorf-Astoria, See Monday

ED-6:30 p.m., E-5:30, C-4:30, M-3:30 C - Jack Dempsey, See Monday B — Three X Sisters, See Monday B — Hree X Sisters, See Monday R — Back of the News-Wm. Hard KECA KEN KFYR KGA KJR KOA KPO KSD KTBS KTHS WBEN WCKY WDAF WEAF WFBR WIBA WIOD WIS WJAR WMAQ WMG WOAI WSB WTAG WWNC

ED-6:45 p.m., E-5:45, C-4:45, M-3:45 R - John Pierce, Tenor KFSD KPO WBEN WCAE WEAF WFBR WHO WIS WJAR WMAQ WMC WOC WOW WSAI WTAG C - Just Plain Bill, See Monday B — Lowell Thomas, See Monday
 B — Orphan Annie, See Monday

ED-7:00 p.m., E-6:00, C-5:00, M-4:00 R — Walberg Brown, See Monday C — Myrt and Marge, See Monday B - Amos 'n' Andy, See Monday

ED-7:15 p.m., E-6:15, C-5:15, M-4:15 B — Murder Mystery, See Monday C — Buck Rogers, See Monday

ED-7:30 p.m., E-6:30, C-5:30, M-4:30 B - String Symphony RDKA KOIL KWCR WBAL WCKY WIOD WIS WJDX WJZ WMAL WMC WREN WSMB WSYR WWNC C -- Dolph Martin, See Monday R — Elvia Allman See Monday

ED-7:45 p.m., E-6:45, C-5:45, M-4:45 C — Boake Carter, See Monday R - The Goldbergs, See Monday

ED-8:00 p.m., E-7:00, C-6:00, M-5:00 C --- Light Opera Gems C — Light Opera Gems CFRB CKOK KFH KLZ KMBC KRLD KSCJ KSL KTSA KVOR WABC WADC WBCM WBIG WCAH WCAO WCAU WDAE WDBJ WDBO WDOD WDRC WDSU WEAN WFBL WFBM WFEA WGR WGST WHEC WHK WHP WIBW WISN WJAS WLAC WLBW WLBZ WNAC WNAX WNOX WOKO WORC WQAM WREC WSFA WSJS WSPD WTAQ WTOC WWVA B — Eng Crime Sub See Tuesday

B --- Eno Crime Club, See Tuesday

ED-8:30 p.m., E-7:30, C-6:30, M-5:30 B — Tastyeast Jesters KDKA WBAL WBZ WBZA WCKY WHAM WJZ

C - Kate Smith, See Tuesday

R — The Shadow, Mystery Drama WBEN WCSH WEAF WEEI WFBR WGY WJAR WLIT WRC WTAG WTIC

ED-8:45 p.m., E-7:45, C-6:45, M-5:45 B - Phil Cook, See Monday C — Abe Lyman, See Tuesday

ED-9:00 p.m., E-8:00, C-7:00, M-6:00 C — Irvin S. Cobb GFRB CKOK KFH KLRA KLZ KMBC KRLD KSCJ KTRH KTSA KVOR WABC WADC WBIG WCAH

#### WEDNESDAY—(Cont'd))

WCAO WCAU WCCO WDAE WDBJ WDBO WDOD WDRC WDSU WEAN WFBL WFBM WFEA WGST WHEC WHK WHP WIBW WICC WISN WHE WHE WHEA WGST WHEC WHK WHP WIBW WICC WISN WJAS WJSV WKBW WLAC WLBW WLBZ WMBD WMT WNAC WNAX WNOX WOKO WORC WPG WNOX WOKO WORC WPG WAEC WSBT WSJS WSPD WTOC R — Famous Brands—Ranny Weeks KSD WBEN WCAE WCSH WDAF WEAF WEEI WGY WJAR WLIT WMAQ WRC WTAG WTAM WTIC WWJ

B — Sherlock Holmes CFCF CKGW KDKA KOIL KWCR KWK WBAL WBZ WBZA WGAR WHAM WJR WJZ WLS WLW WREN

ED-9:15 p.m., E-8:15, C-7:15, M-6:15 C — Romantie Bachelor CKOK KDB KERN KFBK KFH KFPY KFPC KGB KHJ KLRA KLZ KMBC KMJ KMOX KOIN KOL KOMA KRLD KSCJ KSL KTRH KTSA KVI KWG WABC WACO WADU WECO WDBJ WDDD WDRC WCAU WCCO WDBJ WDDD WDRC WCAU WCCO WDBJ WDDD WDRC WCAU WCCO WDBJ WDDD WDRC WCAU WCC WDBJ WDDD WDRC WLAY WHAS WHK WIBW WISN WJAS WJSV WKBH WKBW WKRC WLAX WDS WDJX WOKO WOWO WRAX WNOX WODX WOKO WOWO WRAZ WATA

ED-9:30 p.m., E-8:30, C-7:30, M-6:30 R — Josef Lhevinne, Concert Pianist CFCF CKGW KSD WBEN WCAE WCKY WCSH WDAF WEAE WFBR WFLA WHO WIOD WIS WJAR WJAX WLIT WMAQ WOC WOW WRC WRVA WSAI WTAG WTAM WTIC WWJ WWNC C — Guy Lombardo-Burns and Alian

WTAM WTIC WWJ WWNC C - Guy Lombardo-Burns and AllenCKOK KMBC KMOX KOMA KRLDKTRH KTSA WABC WADC WCAOWCAU WCCO WDRC WEAN WFBLWFBM WGN WHK WJAS WJSYWKBW WKRC WNAC WOKO WOWOWEDDWSPD

#### B - Donald Novis

D - JODAHO ROVIS KDKA KDYL KFI KGHL KGHR KGO KGW KHQ KOA KOIL KOMO KPRC KTAR KTBS KTHS KVOO KWCR KWK WBAL WBZ WBZA WENR WFAA WGAR WHAM WJDX WJR WJZ WKY WLW WOAI WREN WSP WSW WSWF WSB WSM WSMB

ED-10:00 p.m., E-9:00, C-8:00, M-7:00 C — Old Gold—Fred Waring CKOK KDB KERN KFBK KFPY KFRC KGB KHJ KLRA KLZ KMBC KMJ KMOX KOIN KOL KOMO KSL KTAT KTRH KTSA KVI KWG WAAB WABC WADC WBRC WDAF WAAB WABC WADC WBRC WBT WACH WCAO WCAU WCCO WDAE WDBO WDOD WDRC WDSU WFBL WEBU WGN WGST WHAS WHEC WFBM WGN WGST WHAS WHEC WHK WIBW WJAS WJSV WKBW WKRC WODX WOKO WOWO WQAM WREC WRR WSPD

R — Corn Cob Pipe Club KDYL KFI KGHL KGIR KGO KGW KHQ KOA KOMO KSD WBEN WCAE WCSH WDAF WEAF WEEI WENR WFBR WGY WHO WJAR WLIT WLW WOC WOW WRC WRVA WTAG WTAM WTIC WWJ

ED-10:15 p.m., E-9:15, C-8:15, M-7:15 B — Vic and Sade, See Tuesday

ED-10:30 p.m., E-9:30, C-8:30, M-7:30 R — Dance Hits of Yesteryear WAPI WBEN WCAE WCKY WCSH WEAF WEEL WGY WJAR WMC WSB WSMB WTAG WTAM WWJ

WSB WSMB WTAG WTAM WWJ R – Carveth Wells KDYL KFYR KGHL KGIR KOA KPRC KSD KSTP KTBS KTHS WDAF WDAY WEBC WFAA WFBR WHO WIBA WKY WMAQ WOAI WOC WOW WRVA WTMJ

ED-10:45 p.m., E-9:45, C-8:45, M-7:45 C — Myrt and Marge, See Monday C — Little Jack Little WDRC WEAN WHEC WLBW WLBZ WOKO WORC WSPD

ED-11:00 p.m., E-10:00, C-9:00, M-8:00 C — Howard Barlow, See Monday B — Amos 'n' Andy, See Monday

ED-11:15 p.m., E-10:15, C-9:15, M-8:15 B - Murder Mystery, See Monday

ED-11:30 p.m., E-10:30, C-9:30, M-8:30 C — Joe Haymes and Orchestra CFRB CKOK KFAB KFH KLRA KLZ KMBC KMOX KSCJ KSL KTRH KVOR WAAB WABC WACO WADC WCAH WCAO WCAU WCCO WDAE WDBJ WDBO WDOD WDRC WDSU WEAN WFBL WGST WHEC WDSU WEAN WFBL WGST WHEC WHK WHP WIBW WLAC WLBW WLBZ WMBD WMT WNAX WNOX WOKO WORC WPG WQAM WREC WSBT WSJS WSPD WTOC B — Sitteen Male Voices

B - Sixteen Male Voices KSO KWCR KWK WBAL WBZ WBZA WCKY WENR WGAR WHAM WJZ WREN

ED-12:00 p.m., E-11:00, C-10:00, M-9:00 C — Eddie Duchin and Orchestra C — Eddie Duchin and Orchestra CKOK KFAB KLZ KMBC KSCJ KTRH KVOR WABC WBRC WBT WCAH WCAU WCCO WDAE WDOD WDSU WEAN WFBL WGST WHAS WHK WHP WICC WISN WJAS WJSV KKBW WLBW WMBD WMT WJAC WNAX WNOX WOKO WORC WFG WPFC WSPD WSDO WPG WREC WSBT WSPD WTOC

ED-12:15 a.m., E-11:15, C-10:15, M-9:15 B — Sherlock Holmes KDYL KFI KFSD KGHL KGIR KGO KGW KHQ KOA KOMO KTAR

#### THURSDAY

ED-5:45 p.m., E-4:45, C-3:45, M-2:45 B - Orphan Annie, See Monday

ED-6:00 p.m., E-5:00, C-4:00, M-3:00 R --- Waidorf-Astoria, See Monday ĉ - H. V. Kaltenborn

C — H. V. Kattenborn CFRB CKOK KFAB KFH KLZ KSCJ KVOR WAAB WABC WACO WBIG WBRC WDAE WDBJ WDBO WDOD WDRC WDSU WEAN WFEA WGST WHAS WHEC WHP WICC WIP WISN WKBH WKBN WLBW WLBZ WMT WNAX WNOX WODX WOKO WORC WQAM WREC WSBT WSFA WSJS WSPD WTAQ WTAR WTOC

ED-6:15 p.m., E-5:15, C-4:15, M-3:15 C — Ozzie Nelson and Orchestra CFRB CKOK WAAB WABC WACO WBIG WBRC WCAO WDAE WDBJ WDBO WDOD WDRC WDSU WFEA

[38]

WGST WHEC WHP WLBW WLBZ WNOX WODX WOKO WORC WQAM WREC WSBT WSFA WSJS WSPD WTAR WTOC

ED-6:30 p.m., E-5:30, C-4:30, M-3:30 C — Gertrude Niesen CFRB CKOK WAAB WABC WACO WADC WBIG WCAU WDBJ WDOD WDRC WDSU WFEA WGR WGST WHEC WIP WJSV WKBN WLAC WIBW WLBZ WNOX WOKO WORC WQAM WREC WSBT WSFA WSJS WSPD WTOC

WSPD WIGG R — Three Keys KECA KEX KFSD KFYR KGA KJR KOA KPO KSD KTBS KTHS WAPI WDAF WDAY WEAF WFBR WFI WIBA WIS WJAR WMAQ WMC WOAI WSAI WSB WSMB WTAG WWJ WWNC

ED-6:45 p.m., E-5:45, C-4:45, M-3:45 R - Diga Albani, See Monday C - Just Plain Bill, See Monday B — Lowell Thomas, See Monday
 B — Drphan Annie, See Monday

ED-7:00 p.m., E-6:00, C-5:00, M-4:00 R — Walberg Brown, See Monday C — Myrt and Marge, See Monday B — Amos 'n' Andy, See Monday

ED-7:15 p.m., E-6:15, C-5:15, M-4:15 C - Buck Rogers, See Monday **B** — Concert Footlights KOA KOIL KSO KWCR WBAL WIS WJZ WMAQ WREN WSM WSYR WWMC

ED-7:30 p.m., E-6:30, C-5:30, M-4:30 C — Keller, Sargent, See Tuesday

ED-7:45 p.m., E-6:45, C-5:45, M-4:45 C -- Boake Carter, See Monday R - The Goldbergs, See Monday

ED-8:00 p.m., E-7:00, C-6:00, M-5:00 C - Evan Evans-Do Re Mi G — EVAN EVANS—JO HE MI CFRB CKOK KFH KLRA KMBC KSCJ KTRH KTSA KVOR WABC WADC WCAH WCAO WDAE WDBJ WDBO WDDD WDRC WDSU WEAN W DBO WDOD WDRC WDSU WEAN WFBL WFBM WFEA WGR WGST WHAS WHEC WHK WHP WIBW WIP WISN WJAS WJSV WKBH WLAC WLBW WLBZ WMBG WNAC WNOX WOKO WPG WQAM WREC WSFA WSIS WSPD WTAQ WTAR WTOC WWVA

WIOC WWVA R — Rudy Vallee and Orchestra CFCF CKGW KDYL KFI KFYR KGO KGW KHQ KOA KOMO KPRC KSD KSTP KTAR WAPI WBAP WBEN WCAE WCKY WCSII WDAF WDAY WEAF WEBC WEEI WFBR WFI WFLA WGY WHO WIOD WJAR WJAX WJDX WKY WMAQ WMC WOAI WOC WOW WRC WRVA WSAI WSB WSM WSMB WTAG WTAM WTMJ WWJ

ED-8:30 p.m., E-7:30, C-6:30, M-5:30 C — Kate Smith, See Tuesday
 B — Rin Tin Tin Thriller
 KDKA KOIL KWK WBZ WBZA
 WGAR WHAM WJZ WLS WLW

WREN

ED-8:45 p.m., E-7:45, C-6:45, M-5:45 C — Abe Lyman, See Tuesday

B — Howard Thurston, Magician KDKA KOIL KWK WBZ WBZA WGAR WHAM WJR WJZ WLS WLW WREN

#### THURSDAY—(Continued)

ED-9:00 p.m., E-8:00, C-7:00, M-6:00 C — Easy Aces, See Tuesday R — Maxwell House Showboat

R — Maxwell House Showboat K DYL KFI KFSD KGO KGW KHQ KOA KOMO KPRC KSD KSTP KTAR KTBS WAPI WBEN WCAE WCKY WCSH WDAF WEAEI WFBR WFI WFLA WGY WHO WIOD WIS WJAR WJAX WJDX WKY WMAQ WMC WOAI WOC WOW WRC WRVA WSAI WSE WSM WSMB WTAG WTAM WTMI WWI WSMB WTAG WTAM WTMJ WWJ

WWWNC **B** — Death Valley Days KDKA KOIL KWK WBAL WBZ WBZA WGAR WHAM WJR WJZ WLS WLW WREN

ED-9:15 p.m., E-8:15, C-7:15, M-6:15 C — Fray and Braggioiti CFRB CKOK KFH KLRA KLZ KMBC KSCJ KTRH KTSA KVOR WABC WADC WBIG WCAH WCAO WCAU WDAE WDBJ WDBO WDOD WDRC WDSU WEAN WFBL WFEA WCST WHEC WHP WIBW WICC WISN WJAS WKBN WKBW WLAC WLBW WLBZ WMT WNAC WNAX WNOX WOKO WORC WPG WQAM WREC WSBT WSJS WSPD WTOC

ED-9:30 p.m., E-8:30, C-7:30, M-6:30 C — Col. Stoopnagle and Budd CKOK KDB KERN KFBK KFH KFPY KFRC KGB KHJ KLRA KLZ KMBC IKMJ KMOX KOIN KOL KOMA KSCJ KSL KTRH KTAT KTSA KVI KWG WABC WADC WBRC WBT WCAH WCAO WCAU WCCO WDAE WDBO WDRC WDSU WCAN WFBL WFRM WGN WGST WHAS WHEC WHK WJAS WJSV WKBW WKRC WLAC WNAC WOKO WOWO WQAM WREC WRR WSPD WOWO WQAM WREC WRR WSPD WTAR

B — Wayne King and Orchestra KDKA KOIL KSO KWCR KWK WBAL WBZ WBZA WENR WJZ WREN

ED-10:00 p.m., E-9:00, C-8:00, M-7:00 C — The Foreign Legion CFRB CKOK KLRA KLZ KSCJ KTRH KTSA KVOR WAAB WABC WBBM WBIG WBRC WCAO WCAU WCCO WDAE WDBJ WDDO WDOD WDRC WDSU WEAN WFBA WJEA WGST WHEC WHSH WHFA WICC WKBN WLBW WLBZ WMT WNAX WNOX WODX WOKO WORC WQAM WREC WSJS WSPD WTAR WTOC WTOC

R — Lucky Strike—Jack Pearl RDYL KFI KFSD KFYR KGO KGW KHQ KOA KOMO KPRC KSD KSTP KHQ KOA KOMO KPRC KSD KSTP KTAR KTBS KTBS KVOO WBAP WBEN WCAE WCSH WDAF WDAY WEAF WEBC WEEI WENR WFBW WFI WFLA WGY WHO WIBA WIOD WIS WJAR WJAX WJDX WKY WLW WMC WOAI WOCI WOW WRC WRVA WSB WSM WSMB WTAG WTAM WTMJ WWJ WWNC

ED-10:15 p.m., E-9:15, C-8:15, M-7:15 B --- Vic and Sade, See Tuesday

ED-10:30 p.m., E-9:30, C-8:30, M-7:30 C --- Boswell Sisters CFRB CKOK KLRA KLZ KMBC KSCJ KTRH KTSA KVOR WAAB WABC WADC WBBM WBIG WCAH WCAO WCAU WCCO WDAE WDBJ WDBO WDOD WDRC WDSU WEAN WFBL WFBM WFEA WGST WHEC WHK WHP WIBW WICC WISN WJAS WJSV WKBN WKBW WLAC WLBW WLBZ WMBD WMT WNAX WNOX WOKO WORC WPG WQAM WREC WSBT WSJS WSPD WTOC

ED-10:45 p.m., E-9:45, C-8:45, M-7:45 C — Charles Carlile, See Tuesday C - Myrt and Marge, See Monday

ED-11:00 p.m., E-10:00, C-9:00, M-8:00 B — Southern Singers, See Monday R — James Melton, Tenor KSD WCAE WCKY WEAF WFBR WRC WSAI WTAG WWJ C - Howard Barlow, See Monday B - Amos 'n' Andy. See Monday

ED-11:30 p.m., E-10:30, C-9:30, M-8:30 C — Ted Lewis, See Monday R - Jack Denny, See Monday

ED-12:15 a.m., E-11:15, C-10:15, M-9:15 B — Howard Thurston, Magician KDYL KFI KGO KGW KHQ KOA KOMO

#### FRIDAY

ED-5:45 p.m., E-4:45, C-3:45, M-2:45 B - Orphan Annie, See Monday

ED-6:00 p.m., E-5:00, C-4:00, M-3:00 R -- Waldorf-Astoria, See Monday - Do Re Mi Girls

C — Do Re Mi Girls CFRB CKOK KFH KLZ KSCJ KSL KTRH KVOR WAAB WABC WACO WBIG WBRC WDAE WDBJ WDBO WDOD WDRC WDBU WFFA WGST WHAS WHEC WHP WICC WIP WISM WKBH WKBN WKBW WAC WLBW WLBZ WMT WNAX WNOX WODX WOKO WORC WQAM WREC WSBT WSFA WSJS WSPD WTAQ WTAR WTOC

ED-6:30 p.m., E-5:30, C-4:30, M-3:30 R — Betty Boop-Mae Questel KFSD KFYR KOA KPO KSD KTBS KTHS WBEN WDAF WEAF WFBR WGY WIBA WIS WJDX WOAI WSB WSMB WWNC B - Three X Sisters See Monday

ED-6:45 p.m., E-5:45, C-4:45, M-3:45 C - Just Plain Bill, See Monday B — Lowell Thomas, See Monday
 B — Orphan Annie, See Monday

ED-7:00 p.m., E-6:00, C-5:00, M-4:00 R — Walberg Brown, See Monday C — Myrt and Marge, See Monday B — Amos 'n' Andy, See Monday

ED-7:15 p.m., E-6:15, C-5:15, M-4:15 C -- Buck Rogers, See Monday

ED-7:30 p.m., E-6:30, C-5:30, M-4:30 B — Five Star Theatre, See Monday C — Dolphin Martin, See Monday

ED-7:45 p.m., E-6:45, C-5:45, M-4:45 C - Boake Carter, See Monday R - The Goldbergs, See Monday

ED-8:00 p.m., E-7:00, C-6:00, M-5:00 C Betty Barthell CFRB CKOK KFH KLRA KLZ KMBC KRLD KSCJ KSL KTSA KVOR WABC WBIG WCAH WCAO WCCO WDAE WDBJ WDBO WDOD

WDRC WDSU WEAN WFBL WFBM WFEA WGST WHEC WHK WHP WIBW WJAS WJSV WLAC WLBW WLBZ WNAC WNAX WNOX WOKO WORC WOAM WREC WSFA WSJS WSPD WVOC

WSFD w160  $R \rightarrow Cities Service Concert$ CKGW KDYL KOA KPRC KSD KSTP KTBS KYW WBEN WCAE WCSH WDAF WEAF WEBC WEEI WFAA WFBR WGY WHO WJAR WKY WLIT WOAI WOC WOW WRC WSAI WTAG WTAM WTIC WTMJ WEY WWJ

B — Nestle's Program KDKA KOIL KWK WBAL WBZ WBZA WGAR WHAM WJR WJZ WLS WREN

ED-8:30 p.m., E-7:30, C-6:30, M-5:30 C — Carson Robison and Buckaroos CFRB CKOK KFH KLRA KLZ KMBC KMOX KSCJ KSL KTSA KVOR WABC WADC WBIG WCAH WCAO WCAU WCCO WDAE WDBJ WDBO WDOD WDRC WDSU WEAM WTDU WEDL WDDU WEAM WDBO WDOD WDRC WDSO WEAN WFBL WFBM WFFA WGR WGST WHEC WHIX WHA WISW WLAC WLBW WISN WJAS WJSV WLAC WLBW WLBZ WNAC WNAX WODX WOKO WORC WFG WQAM WREC WSFA WSJS WSPD WTOC

B — Horlick Program, See Tuesday

ED-8:45 p.m., E-7:45, C-6:45, M-5:45 B - Howard Thurston, See Thursday

ED-9:00 p.m., E-8:00, C-7:00, M-6:00 C — Irvin S. Cobb, See Wednesday B — First Nighter, Drama KDKA KDYL KFI KISD KGO KGW

KDRA KDTL KFI KFSD KGO KGW KHQ KOA KOIL KOMO KPRC KSTP KTAR KTBS KWK WAPI WBAL WBZ WBZA WCKY WEBC WGAR WHAM WJR WJZ WKY WLS WGAI WREN WSB WSM WSMB WTMJ

R — MUSICAI GROCERY STORE KSD WBEN WCSII WDAF WEAF WEEI WFBR WGY WJAR WLIT WMAQ WRC WTAG WTAM WTIC

ED-9:30 p.m., E-8:30, C-7:30, M-6:30 R — Pond's Program

R → Pond's Program KSD WBEN WCAE WCSH WDAF WEAF WENR WFBR WGY WHO WJAR WLIT WOC WOW WKC WSAI WTAG WATAM WWJ C → Edwin C. Hill, Inside Stary CKOK KFH KLRA KMBC KMOX KOMA KRLD KTRH KTSA WABC WADC WBCM WCAH WCAO WCAU WCCO WDRC WEAN WFBL WFBM WGN WHAD WHAS WIIK WHP WIBW WJAS WJSV WKBH WKBW WKRC WLBW WLBZ WMBD WNAC WOKO WORC WOWO WREC WSPD B → Arman Program

B — Armour Program KDKA KDYL KFI KGO KGW KHQ KOA KOIL KOMO KPRC KSO KSTP KWK WAPI WBAL WBZ WBZA WEBC WFAA WGAR WHAM WIOD WJAX WJR WJZ WKY WMAQ WMC WOAI WREN WRYA WSB WSM WSMB WTMJ WWNC

ED-10:00 p.m., E-9:00, C-8:00, M-7:00 C - Columbia Revue CFRB CKOK KLRA KLZ KMBC KSCJ KSL KTRII KTSA KVOR WAAB WABC WADC WBIG WCAH WCAO WCAU WCCO WDAE WDBJ WDBO WDOD WDRC WDSU WEAN WFBL WFBM WFEA WGST WHEC

#### FRIDAY—(Continued)

WHP WIBW WICC WJAS WJSV WKBW WLAC WLBW WLBZ WMBD WMT WNAX WNOX WODX WOKO WORC WQAM WREC WSBT WSJS WSPD WTOC

WSPD WTOC R - Chevrolet-Jack Benny KDYL, KFI KFSD KFYR KGHL KGIR KGO KGW KHQ KOA KOMO KPRC KSD KSTP KTAR KTBS KTHS KVOO WBEN WCAE WCSH WDAY WEAY WEAF WEBC WEEI WENR WFAA WFBR WFLA WGY WHO WIBA WIDD WIS WJAR WJAX WKY WLIT WLW WMC WCAL WCC WOW WRC WRVA WSR WOAI WOC WOW WRC WRVA WSB WSM WSMB WTAG WTAM WTIC WTMJ WWJ WWNC

WINJ WWJ WWNC B -- Dorothy Fields--Jimmy McHugh CFCF KOLL KPRC KSO WBAL WCKY WHAM WJR WJZ WMAQ WREN WSYR

ED-10:15 p.m., E-9:15, C-8:15, M-7:15 B - Vic and Sade, See Tuesday

ED-10:30 p.m., E-9:30, C-8:30, M-7:30 Street Singer C ....

C — Street Singer GERB CKOK KLRA KLZ KMBC KSCJ KTRH KTSA KVOR WAAB WABC WADC WBIG WCAH WCAO WCAU WCCO WDBJ WDBO WDOD WDRC WDSU WEAN WFEL WFBM WGST WHEC WHS WJAS WJSV WHBW WLCC WISN WJAS WJSV WKBW WLCC WISN WJAS WJSV WKBW WLCC WLSN WLAS WJSV WKBW WAA WNOX WODX WOKO WORC WYG WQAM WREC WSBT WSJS WSPF WTOC R — Bichfield Country Club

R — Richfield Country Club WBEN WCAE WEAF WEEI WFBR WGY WJAR WLIT WRC WTIC

ED-10:45 p.m., E-9:45, C-8:45, M-7:45 C — Little Jack Little, See Wednesday C — Myrt and Marge, See Monday

ED-11:00 p.m., E-10:00, C-9:00, M-8:00 C — Howard Barlow, See Monday B - Amos 'n' Andy, See Monday

ED-11:15 n.m., E-10:15, C-9:15, M-8:15 B - Welcome Lewis, Vocalist B - Welcome Lewis, Vocalist CFCF CKGW KSO KSTP KWCR KWK WBAL WBZ WBZA WCKY WFLA WGAR WHAM WIBA WIOD WIS WJAX WJR WJZ WREN WSYR WWNC

ED-11:30 p.m., E-10:30, C-9:30, M-8:30 C -- Abe Lyman, See Tuesday B -- Phantom Gypsy, See Monday

ED-12:00 p.m., E-11:00, C-10:00, M-9:00 C - Ben Pollack and Orchestra C — Ben Pollack and Orchestra CKOK KFAB KLZ KMBC KRLD KSCJ KSL KTRH KVOR WABC WBRC WBT WCAU WCCO WDAE WDOD WDSU WICC WISN WJSV WLBW WMBD WNAC WNAX WOKO WFG WSBT WSPD WTOC

ED-12:15 a.m., E-11:15, C-10:15, M-9:15 B — Howard Thurston, See Thursday

ED-12:30 a.m., E-11:30, C-10:30, M-9:30 R — Musical Grocery Store KDYL KFI KFSD KGO KGW KHQ KOA KOMO KTAR

#### SATURDAY

ED-5:45 p.m., E-4:45, C-3:45, M-2:45 B - Orphan Annie, See Monday

ED-6:00 p.m., E-5:00, C-4:00, M-3:00 B — Don Bestor and Orchestra KDKA KOIL KSO KWCR KWK WBAL WENR WHAM WJR WJZ WMAL WREN WYAM WJR WJZ WMAL WREN WSYR C — America's Grub Street CFRB CKOK KFAB KFH KSCJ KSL KTRH KVOR WAAB WABC WADC WBAM WBCM WBIG WBRC WDC WDCW WDCW WDG WBC WDC WDCW DWRC WDSU WEAN WHCW WJCZ WNAX WORC WORC WQAM WSBT WSFA WSJS WSPD WTAR WTOC WWA R — Waldorf-Astoria, See Monday R - Waldorf-Astoria, See Monday ED-6:15 p.m., E-5:15, C-4:15, M-3:15 C — Paul Tremaine and Orchestra CFRB CKOK KFH KLZ KSCJ KTRH

KVOR WAAB WABC WACO WADC WBRC WCAH WCAO WCCO WADC WDBJ WDBO WDOD WDRC WDSU WEAN WFBL WFEA WGR WGST WHEC WHP WIBW WIP WISN WJAS WJSV WKBH WLAC WLBW WLAS WJSV WKBH WLAC WLBW WORC WQAM WREC WSFA WSJS WSPD WTAQ WTAR WTOC

ED-6:30 p.m., E-5:30, C-4:30, M-3:30 C — Ozzie Nelson and Orchestra CFRB CKOK KTRH WAAB WABC WACO WADC WBIG WCAO WCAU WDAE WDBJ WDBO WDDO WDRC WDSU WEAN WFRA WGR WGST WHEC WHP WICC WJSV WLAC WLBW WLBZ WNOX WOADX WOKO WORC WQAM WREC WSBT WSFA WSJS WSPD WTOC B — Laws That Safeouard

WSJS WSPD W10C B – Laws That Safeguard KDYL KEX KFSD KFYR KGA KGIR KJR KOA KOIJ KPO KPRC KSO KSTP KTAR KTBS KTHS KWCR KWK WBAL WBZ WBZA WCKY WEBC WFLA WIBA WIOD WIS WJAX WJR WJZ WKY WMAQ WMC WOAI WREN WRVA WSB WSMB WWVC WSMB WWNC

ED-6:45 p.m., E-5:45, C-4:45, M-3:45 R — Southern Singers CKGW WBEN WCAE WEAF WEEI WFBR WGY WIOD WIS WJAR WJAX WMC WRC WSAI WTAG WWNC

B - Orphan Annie, See Monday

ED-7:00 p.m., E-6:00, C-5:00, M-4:00 B — American Taxpayers' League KDKA KDYL KPSD KGA KJR KOA KPO KSO KTBS KWCR WBAL WEBC WFLA WHAM WIBA WJR WJZ WMAL WMC WSB WSMB WSYR WWNC C - Frederic William Wile KMBC KRLD KTRH WABC WADC WBBM WBCM WBIG WBRC WBT WBBM WBCM WBIG WBRC WB WCAO WCAU WDAE WDBO WDOD WDRC WDSU WEAN WFBM WFEA WGR WHEC WHK WICC WJAS WJSV WLBW WLBZ WNAC WOKO WQAM WSFA WSPD WTAR WWVA

ED-7:15 p.m., E-6:15, C-5:15, M-4:15 C - Charles Barnet and Orchestra GFRB CKOK KFAB KFH KLRA KMBC KMOX KSCJ KSL KTRH KVOR WABC WADC WBBM WBIG WCAH WCAO WCAU WCCO WDAE WDBJ WDOD WDRC WDSU WEAN WFBL WFBM WFEA WGR WGST WHEC WHP WICC WISN WJAS WJSV WLAC WLBW WLBZ WNAC WNAX WNOX WOKO WORG WQAM WHECC WSFA WSJS WSPD WTAQ WWVA

B - Murder Mystery, See Monday

ED-7:30 p.m., E-6:30, C-5:30, M-4:30 R — Elvia Allman, See Monday

ED-7:45 p.m., E-6:45, C-5:45, M-4:45 B — Vincent Lopez and Orchestra KDKA KDYL KFSD KFYR KOA KPO KSO KTBS WBAL WEBC WFLA WIRA WJR WJZ WMC WSB WSMB WSYR WWNC

WSMB WSYR WWNC R — The World Today KFYR KTBS WBEN WDAF WEAF WENR WFBR WFLA WGY WHO WIBA WIS WJAR WJAX WKY WOAI WOC WOW WPTF WRC WSAI WTAG WTAM WWJ WWNC

- Street Singer С.

C — Street Singer CFRB CKOK KMBC KMOX KRLD KSCJ KSL KTRH KVOR WABC WADC WBCM WBIG WBRC WBT WCAO WCAU WCCO WDAE WDBO WDOD WDRC WDSU WEAN WFBA WFEA WGR WHEE WISN WJAS WJSV WKBH WLBW WLBZ WNAC WOKO WQAM WSFA WSPD WTAQ WTAR WTOC

ED-8:00 p.m., E-7:00, C-6:00, M-5:00 R — Kaltenmyer's Kindergarten CKGW KFYR KPO KOA KPRC KSD

KSTP KTBS WBEN WCKY WDAY WEAF WEBC WEI WDAF WEAF WEBC WEEL WEI WDAY WEAF WEBC WEEL WFI WGY WHO WIBA WIOD WIS WJAR WMAQ WMC WOAI WOC WRC WSAI WSMB WTAG WWJ WWNC

ED-8:15 p.m., E-7:15, C-6:15, M-5:15 C — Magic Voice, See Tuesday B — Boston Symphony Orchestra CFCF CKGW KDKA KOIL KSO KWCR KWK WBAL WBZ WBZA WCRY WGAR WHAM WJR WJZ WREN

ED-8:30 p.m., E-7:30, C-6:30, M-5:30 C — Leon Belasco and Orchestra G - Leon Belasco and Orcnestra CFRB CKOK KFH KLRA KLZ KMBC KSCJ KSL KTRH KTSA KVOR WABC WADC WBIG WCAH WCAO WCAU WCCO WDAE WDBJ WDBO WDOD WDRC WDSU WEAN WDBO WDOD WDRC WDSU WEAN WFBL WFBM WFEA WGR WGST WHEC WHK WHP WIBW WICC WISN WJAS WJSV WLAC WLBW WLBZ WMT WNAC WNAX WNOX WODX WOKO WORC WQAM WREC WSBT WSFA WSPD WTAQ WTOC R - Economic World TodayKDYL KFSD KFYR KGA KFHL KGIR KJR KOA KFO KPRC KSD KSTP WAPI WBAP WBEN WCSH WDAY WDAY WEAF WEBC WEEI WDAF WDAY WEAF WEBC WEEI

WDAF WDAI WEAF WEBC WEEL WFBR WFI WFLA WGY WHO WIBA WIOD WIS WJAR WJDX WKY WMAQ WMC WOAI WOC WOW WMAQ WMC WOAI WOC WOW WRC WSAI WSMB WTAG WTAM WWJ WWNC

ED-9:00 p.m., E-8:00, C-7:00, M-6:00 C - Easy Aces, See Tuesday R - Ranny Weeks, See Wednesday

#### SATURDAY—(Continued)

ED-9:15 p.m., E-8:15, C-7:15, M-6:15 C--- Boswell Sisters

C — Boswell Sisters CFRB CKOK KFH KLRA KLZ KMBC KMOX KRLD KSCJ KSL KTRH KTSA KVOR WAAB WABC WACO WADC WBBM WBCM WBIG WBAC WBT WCAH WCAO WCCO WDAE WDBJ WDBO WDDD WDSU WEAN WFBL WFBM WFEA WGST WHAS WHEC WIBW WICC WIP WISN WIAS WISY WKBH WKBW WIAS WHEC WIEW WICC WIP WISN WJAS WJSV WKBH WKBW WLBZ WMT WNAX WNOX WODX WOKO WORC WOWO WQAM WREC WSPD WTAR WTOC

ED-9:45 p.m., E-8:45, C-7:45, M-6:45 C --- Saturday Frivolities C - Saturday revolutes CFRB CKOK KFH KLRA KLZ KMBC KMOX KSCJ KSL KTRH KTSA KVOR WABC WADC WBBM WBIG WCAH WCAO WCAU WCCO WDAE WDBJ WDBO WDOD WDSU

WEAN WFBL WFBM WFEA WGST WHP WIBW WICC WJAS WJSV WHP WIBW WICC WJAS WJSV WKBW WLAC WLBW WLBZ WMBD WMT WNAC WNAX WNOX WODX WOKO WORC WPG WQAM WREC WSBT WSJS WSPD WTOC

ED-10:00 p.m., E-9:00, C-8:00, M-7:00 - Gilbert and Sullivan Gems R KOIL KSO KWCR WBZ WBZA WCKY KDKA KWK WBAL WBZ WBZA WCKY WFLA WGAR WHAM WIS WJAX WJR WJR WMAL WREN WRVA WSYR WJZ WWNC

R - B. A. Rolfe and Orchestra CFCF CKGW KDYL KFI KOA KSD KSTP WBAP KGO WBEN KOA KOA KSD KSTP WBAP WBEN WCAE WCSH WDAF WEAF WEE WFBR WFI WGY WHO WJAR WLW WMAQ WOC WOW WRC WSB WSMB WTAG WTAM WWJ

ED-10:15 p.m., E-9:15, C-8:15, M-7:15 - Public Affairs Institute c C — Public Anars institute KFH KLZ KSCJ KTRH KTSA KVOR WAAB WBAC WADC WBBM WBCM WBIG WBRC WBT WCAO WCAU WCCO WDAE WDBO WDDD WDRC WDSU WEAN WFBM WFEA WHEC WJAS WJSV WKBH WLBW WICC WLCC WJAS WJSV WRBH WLBW WLBZ WMBD WNAX WOKO WORC WPG WQAM WSBT WSJS WSPD WTAR WTOC WWVA

ED-10:30 p.m., E-9:30, C-8:30, M-7:30 B — Cuckoo Program

CKGW KDKA KOIL KSO KWCR KWK KYW WBAL WCKY WGAR WHAM WJZ WREN WSYR

ED-10:45 p.m., E-9:45, C-8:45, M-7:45 C — Gertrude Niesen

C — Gertride Niesen GFRB CKOK KFH KLRA KLZ KMBC KSCJ KTRH KTSA KVOR WAAB WABC WBIG WCAO WDAE WDBJ WDBO WDDO WDRC WDSU WEAN WFEA WGST WHAS WHEC WHK WHP WICC WIP WISN WJAS WJSV WKBW WLAC WLBW WLBZ WMBD WMT WNAX WNOX WODZ WOKO WORC WFG WQAM WREC WSET WSJS WSPD WTAR WTOC WWYA WWVA

WBZA WEBC WFAA WFLA WGAR WHAM WIBA WIOD WIS WJDX WJR WJZ WKY WLW WMAQ WMC WREN WSB WSMB WSYR WWNC C - Joe Haymes and Orchestra C – JOC Haymes and orcuesua CFRB CKOK KFAB KLRA KLZ KMBC KSCJ KSL KTRH KVOR WAAB WABC WACO WADC WCAH WCAO WCAU WCCO WDAE WDBJ WDBO WDOD WDSU WEAN WFBM WGR WGST WHEC WHK WHP WIBW WICC WISN WJAS WJSY WIBW WICC WISN WJAS WJSV WLAC WLBW WLBZ WMBD WMT WNAX WNOX WODX WOKO WORC WQAM WREC WSBT WSJS WSPD WTOC WWVA

ED-11:10 p.m., E-10:10, C-9:10, M-8:10 R — Jack Denny and Orchestra KSD WBEN WCAE WCKY WCSH WDAF WEAF WEEI WFBR WFI WGY WHO WJAR WMAQ WOC WRC WSAI WTAG WWJ

ED-11:15 p.m., E-10:15, C-9:15, M-8:15 B — Murder Mystery, See Monday

ED-11:30 p.m., E-10:30, C-9:30, M-8:30 B - Phantom Gypsy, See Monday Harold Stern and Orchestra R-KSD WBEN WCAE WCKY WCSH WDAF WEAF WEEI WFBR WFI WGY WHO WJAR WMAQ WOC WRC WSAI WTAG WTAM WWJ

ED-12:00 m., E-11:00, C-10:00, M-9:00 R — Johnny Johnson and Orchestra KSD WCAE WCKY WDAF WEAF WFBR WFI WGY WHO WJAR WMAQ WCC WRC WTAG WTAM C — Ben Pollack, See Friday B — Mark Fisher's Orchestra KOIL KSO KWCR KWK KYW WGAR WJZ WLW WRC WREN

ED-12:30 a.m., E-11:30, C-10:30, M-9:30

**R** — Art Kassel and Orchestra KSD WBEN WCAE WCKY WDAF WEAF WFBR WFI WHO WJAR WOC WRC WTAG WTAM

B --- Sam Robbins' Bermudians KDYL KECA KEX KFSD KFYR KDYL KECA KEX KFSD KFYR KGA KJR KOIL KPO KPRC KSTP KTBS KVOO KWCR KWK KYW WDAY WEBC WFAA WFLA WGAR WHAM WIBA WIOD WJAX WJZ WKY WLW WMC WOAI WREN WSB WSMB WWNC

#### SUNDAY

### ED-11:15 a.m., E-10:15, C-9:15, M-8:15

ED-11:15 a.m., E-10:15, G-9:15, M-8:15 R = Major Bowes' FamilyKDYL KEX KFSD KFYR KGA KJRKOA KPO KPRC KVOO WBAPWDAF WDAY WEAF WFBR WFLAWGY WHO WIOD WJAR WJAXWKY WHO WOO WRC WSM WSMBWTAG. WTAM WTMJ WWJ WWNC

ED-12:00 p.m., E-11:00, C-10:00, M-9:00 C — Salt Lake Tabernacle Choir CFRB CKOK KFAB KLZ KSCJ KSL CFRB CKOK KFAB KLZ KSCJ KSL KTRH KTSA KVOR WABC WADC WBCM WBIG WBT WCAO WCAU WCCO WDAE WDBO WDDO WDRC WDSU WEAN WFEA WGR WHEC WHK WIBW WISN WJAS WJSV WKBH WKBN WLBW WLBZ WMBD WNAC WNAX WODX WOKO WORC WPG WQAM WSBT WSJS WSPD WTAQ WTAR WWVA ED-12:15 p.m., E-11:15, C-10:15, M-9:15

B – Radie Gity Concert GFCF CKGW KDKA KDYL NECA KEN KFSD KFYR KGA KJYL NECA KOLL KPO KPRC KSTP KTAR KVOO KWK WAPI WBAL WBZ WJZA WDAY WEBC WFAA WFLA WBAA WDAY WEBC WFAA WFLA WGAR WHAM WIBA WIOD WIS WJAX WJR WJZ WKY WLW WMAQ WOAI WRC WREN WRVA WSB WSM WSMB WSYR WWNC

ED-12:30 p.m., E-11:30, C-10:30, M-9:30 C — Emery Deutsch and Orchestra CFRB CKOK KFAB KLZ KMBC KSCJ KSL KTRH KTSA KVOR WAAB WABC WADC WBIG WCAH WCAO WCCO WDAE WDBJ WDBO WCAO WCCO WDAE WDBJ WDBO WDOD WDSU WFBL WFEA WGR WGST WHEC WHK WHP WIBW WISN WJAS WJSV WKBN WLBU WLBZ WMBD WMT WNAX WOKO WORC WPG WQAM WREC WSBT WSJS WSPD WTAQ WTOC WWVA WSJS WSPD WIAQ WIOC WWA R- Waiter Logan Pop Concert CFCF CKGW KDYL KFYR KOA KPRC KSTP KTBS KVOO WAPI WBEN WCAF WCKY WCSH WDAF WDAY WEAF WERC WEEI WFAA WFBR WFI WGY WHO WIOD WIS WJAR WKY WOC WRVA WSAI WSE WIBA WHO WOAT WSAI WSB WSM WSMB WTAG WTAM WWJ WWNC

ED-12:45 p.m., E-11:45, C-10:45, M-9:45 C - Street Singer

C — Street Singer CFRB CKOK KFAB KLZ KMBC KSCJ KSJ, KTRH KTSA KVOR WABC WADC WBCM WBIG WBT WCAO WCCO WDAE WDBO WDOD WDSU WGR WHEC WHK WIBW WISN WJAS WJSV WKBH WKBN WLBW WLBZ WMBD WNAX WODX WOKO WFG WQAM WSJS WSPD WTAQ WTAR WTOC WWVA

ED-1:00 p.m., E-12:00, C-11:00, M-10:0 - Columbia Church of the Air С

C — Columpia Church of the Air CFRB CKOK KLZ KSCJ KSL KKTH KTSA KVOR WAAB WABC WADC WBCM WBIG WCAO WCCO WDAE WDBO WDOD WDRC WDSU WGR WHICC WIBW WJAS WJSV WKBH WHEC WIBW WJAS WJSV WKBH WLBW WLBZ WNAX WODX WOKO WPG WQAM WSBT WSJS WSPD WTAQ WTAR WTOC WWVA

ED-1:15 p.m., E-12:15, C-11:15, M-10:15 B — Cook Travelogues KDKA WBAL WBZ WBZA WCKY WGAR WHAM WJR WJZ WMAL WMAQ WSYR

ED-1:30 p.m., E-12:30, C-11:30, M-10:30

C — Lazy Dan, Minstrel Man CKOK KMBC KMOX WAAB WABC WBBM WCAH WCAO WCAU WCCO WHAS WJAS WJSV WKRC WMBG Moonshine and Honeysuckle

H — MOONSHIRE AND HODEYSUCKIE CFCF CKGW KFI KFSD KFYR KGO KGW KHQ KOA KOMO KFRC KSD KSTP KTBS KVOO WAPH WEEN WCAE WCKY WCSH WDAF WDAY WEAF WEBC WFAA WFI WCW WTUG WHDA WIOD WIG WIDD WGY WHO WIBA WIOD WIS WJAR WJAX WKY WMAQ WOAI WOC WOW WRC WRVA WSAI WSB WSM WSMB WTAG WTAM WWJ WWNC

ED-2:00 p.m., E-1:00, C-12:00, M-11:00 ED-2:00 p.m., E-1:00, C-12:00, M-11:00 C — Smiling Ed McGonnell CKOK KERN KFBK KFPY KFRC KGB KHJ KLZ KMBC KMOX KOIN KOL KSL KVI KWG WABC WBBM WBT WCCO WDSU WGR WGST WHAS WHEC WJAS WJSV WKRC WLAC WNAC WOWO WQAM WRR B — Monarch Mystery Tenor KDKA KDYL KFI KFYR KGO KOA KOIL KSO KSTP WWOP KWY WPP KOIL KSO KSTP KWCR KWK WBZ WBZA WCKY WDAY WEBC WGAR WHAM WIBA WJAR WJAX WJR WJZ WMAQ WREN WTMJ WWNC R - Clyde Doerr's Saxophone Octet M - CIJOB OUCH'S SAXOPHONE OCIEI CFCF KSD KTBS KTBS WAPI WBEN WCAE WCKY WEAF WFAA WFBR WGY WHO WJAR WJDX WMC WOAI WOCC WOW WSAI WSM WSMB WTAG WTAM WWJ CFCF

ED-2:15 p.m., E-1:15, C-12:15, M-11:15  $R \rightarrow Pilgrims Mixed Chorus$ CFCF KDYL KFI KFSD KFYR KGHL KGIR KGO KHQ KOA KOMO KPRC KSD KTAR KTBS KTHS KVOO KYW WAPI WBEN WCKY WCSH WDAY WEAF WEBC WEBU WFAA WFRP WCGY WHO WIDA WIS WEAR WEAF WEAF WEBC WEEL WFAA WFBR WGY WHO WIBA WIS WJAR WJAX WJDX WKY WMC WOAI WOC WOW WPTF WRVA WSAI WSM WSMB WTAG WWJ WWNC

#### B — International Radio Forum

KDKA KOIL KSO KWCR KWK WBAL WJZ WMAL WMAQ WREN WSYR

WSIN C — Albert Bartlett Tango King CKOK KMBC KMOX WABC WBBM WCAO WCAU WGR WHEC WHK WJAS WJSV WKRC WNAC WOKO WOWO

ED-2:30 p.m., E-1:30, C-12:30, M-11:30 R — Joe Green's Marimba Band CFCF CKGW WBEN WCAE WCKY WDAF WEAF WFDR WGY WJAR WMAQ WOW WRC WTAG WTAM - Northwestern Chronicle, Drama KA KDYL KFI KFSD KFYR KDKA KDKA KDYL KFI KFSD KFYR KGHL KGIR KGO KGW KHQ KOA KOIL KOMO KPRC KSO KST KTAR KTHS KVOO KWCR KWK KYW WAPI WBAL WBZ WBZA WDAY WEBC WFAA WFLA WGAR WHAM WIBA WIOD WIS WJAX WJDX WJR WJZ WKY WLW WMAL WMC WOAI WPTF WREN WRVA WSB WSM WSMB WTMJ WWNC C View Arden and Orchester C -- Victor Arden and Orchestra CKOK KMBC KMOX WABC WBBM WCAO WCAU WGR WHEC WHK WJAS WJSV WKRC WNAC WOKO WOWO

ED-3:00 p.m., E-2:00, C-1:00, M-12:00 Goldman Band KOIL KSO KWCR KWK WBAL WOKY WGAR WHAM WJZ WMAL WMAQ WREN WSYR C - N. Y. Philharmonic Orchestra CFRB CKOK KFAB KFH KLZ KMBC

CFRB CKOK KFAB KFH KLZ KMBC KRLD KSCJ KSL KTRH KVOR WAAB WABC WADC WBCM WBIG WBRC WBT WCAO WCCO WDAE WDBO WDOD WDRC WDSU WFAN WFBM WFEA WHEC WHK WIBW WICC WIP WISN WJAS WJSV WKBH WKBN WKBW WLBW WLBZ WMBD WODX WOKO WORC WQAM WSBT WSFA WSJS WSPD WTAQ WTAR WTOC WWVA

R — Wayne King and Orchestra KDVL KFI KGO KGW KHQ KOA KOMO KPRC KSD KSTP KTBS KTHS KVOO KYW WBEN WCAE WCKY WCSH WDAF WEAF WEBC WCKY WCSH WDAF WEAF WEBC WKY WLIT WOAI WDAF WFBR WG1 WLIT WEEI WFAA WFBR WGY WHO WIBA WJAR WKY WLIT WOAI WOC WOW WRC WSAI WTAG WTAM WTMJ WWJ

ED-3:30 p.m., E-2:30, C-1:30, M-12:30 R — Dr. S. Parkes Cadman KDYL KFSD KFYR KGHL KGO

KGY KHQ KOA KOMO KPRC KSD KSTP KTAR KTHS KVOO WBEN WCAE WCSH WDAF WDAY WEAF WEBC WEEI WFBR WGY WHO WIBA WJAR WKY WLIT WOAI WOC WOW WRC WSAI WTAM WWJ

ED-4:00 p.m., E-3:00, C-2:00, M-1:00 R — Singing, Well-Spring of Music CFCF CKGW KDYL KFI KFSD KFYR KGO KGW KHQ KOA KOMO KPRC KTAR KTBS KTHS KVOO WAPI WBAP WBEN WCAE WDAF WEAF WEBC WFBR WFLA WGY WAPI WBAP WBEN WCAE WDAF WEAF WEBC WFBR WFLA WGY WIOD WIS WJAR WJAX WJDX WKY WLJT WMAQ WMC WOAI WOW WRC WRVA WSAI WSB WSM WSMB WTAG WTAM WWJ WWNC - Dick Daring Children's Sketch KDKA KOIL KSO KWCR KWK WBAL WBZ WBZA WCKY WHAM WJZ WMAL WREN WSYR

#### ED-4:15 p.m., E-3:15, C-2:15, M-1:15 B - Symphonette

B — Sympnonette CFCF CKGW KDKA KOIL KPRC KSO KTBS KWCR KWK WBAL WBAP WCKY WFLA WHAM WIOD WJAX WJZ WMAL WMC WOAI WREN WRVA WSB WSM WSMB WOVD WUMC WSYR WWNC

R - Wildroot-Vee Lawnhurst  $\mathbf{R} \longrightarrow WIDTOOT - Vec Lawindrsi$ KDYL KFI KGO KGW KHQ KOAKOMO WBEN WCAE WCSH WDAFWEAF WEEI WFBR WGY WJARWLIT WMAQ WOW WRC WSAIWTAG WTAM WWJ

ED-4:30 p.m., E-3:30, C-2:30, M-1:30 R — Temple of Song WBE:N WCAE WCSH WDAF WEAF WEAF WEAF WHAQ WOW WFI WGY WJAR WMAQ WOW WRC WSAI WTAG WTAM WWJ **B** — National Youth Conference

B — National Touth Conference KDYL KFSD KFYR KGHL KGO KGW KHQ KOA KOIL KOMO KPRC KSO KSTP KTAR KVOO KWCR KWK WAPI WBAL WBZ WBZA WDAY WEBC WENR WHAM WIOD WIS WJAX WJDX WJZ WMC WOAI WPTF WREN WRVA WSB WSM WWNC

ED-5:00 p.m., E-4:00, C-3:00, M-2:00 C — Roses and Drums CKOK KMBC KMOX KRLD WAAB WABC WADC WCAO WCCO WDSU WGN WGR WHAS WHK WJAS WJSV WKRC R — Lowell Thomas WBEN WCAE WEAF WEEI WFBR WGY WJAR WRC WSAI WTAG WTAM WWJ B — National Vespers KFSD KFYR KGHL, KGO KGW KFSD KFYR KGHL KGO KGW KHQ KOA KOIL KOMO KPRC KSO KTAR KTBS KWCR KWK WAPI WBAL WBAP WBZ WBZA WEBC WFLA WGAR WIOD WIS WJAX

WJDX WJZ WOAI WPTF WREN WSB WSM WSMB WWNC

ED-5:15 p.m., E-4:15, C-3:15, M-2:15 **R** — Sheffter and Gould, Piano Team WBEN WCAE WCSH WEAF WEEI WFBR WFI WGY WJAR WMAQ WRC WSAI WTAG WTAM WWJ

ED-5:30 p.m., E-4:30, C-3:30, M-2:30 C — Blue Coal Musical Revue WAAB WABC WCAO WCAU WDRC WEAN WFBL WGR WHEC WHP WOKO

B — Pages of Romance, Drama RDKA KOIL KSO KWCR KWK KYW WBAL WBZ WBZA WGAR WJR WJZ WLW WREN

WJR WJZ WLW WREN R - Swit Garden Program CKGW KSD WBEN WCAE WCSH WDAF WEAF WEEI WFBR WFJ WGY WHO WJAR WMAQ WOC WOW WRC WSAI WTAG WTAM WWJ

ED-6:00 p.m., E-5:00, C-4:00, M-3:00 R — Catholic Hour

R — Catholic Hour KDYL, KEX, KFYR, KGHL, KGIR, KJR KOA, KPRC KSD KTAR, KTBS KVOO WAPI WBAP WBEN WCAE WCKY WCSH WDAF WDAF WDAY WGY WHO WIBA WIOD WIS WJAR WJAX, WJDX, WKY, WLIT, WMC WOAI WOC, WOW, WRC, WRVA WSAI, WSB, WSM, WSMB, WTAG WTAM, WWJ, WWNC C — The Lawyer and Public

WTAM WWJ WWNC C — The Lawyer and Public CFRB KFAB KFH KLZ KRLD KSCJ KSL, KVOR WAAB WABC WACO WBCM WBIG WBRC WCAO WCCO WDAE WDBJ WDBO WDOD WDRC WDSU WEAN WFEA WGST WHAS WHP WIBW WICC WISN WHBH WLBW WLBZ WNAX WNOX WODX WOKO WORC WPG WQAM WREC WSFA WSJS WSPD WTAQ WTAR WTOC WWVA

ED-6:30 p.m., E-5:30, C-4:30, M-3:30 B -- Gordon String Quartet CFCF CKGW KOLL KSO KWCR KWK WBAL WBZ WBZA WCKY WENR WGAR WHAM WJR WJZ

WENR WGAR WHAM WJR WJZ WLW WMAL WREN WSYR C — Cathedral Hour

C — Cathedrai Hour CFRB CKOK KFH KLZ KMBC KRLD KSCJ KSL KVOR WAAB WABC WADC WBBM WBCM WBIG WBRC WBT WCAO WCAU WCCO WDAE WDBO WDOD WDRC WDSU WFBM WFEA WHEC WIBW WCC WISN WJAS WJSV WKBH WKEN WWKB WLBW WLBZ WNAX WOKO WORC WQAM WSBT WSFA WSJS WSPD WTAR WTOC WWVA R — Our American Schools

R — Our American Schools

KDYL KECA KEX KFSD KFYR KGA KOA KPO KPRC KSD KSTF KTBS KVOO WBAP WBEN WCAE WCSH WDAY WEAF WEBC WEEI WCSRI WEAR WEAR WEBC WEBC WEAR WFBR WFLA WGY WIBA WIOD WJAR WKY WLIT WMC WOAI WOW WPTF WRC WRVA WSAI WSM WSMB WTAG WWJ WWNC

ED-7:00 p.m., E-6:00, C-5:00, M-4:00 B — Borrah Minevitch, Harmonica KDYL KFYR KOA KOIL KPRC KSO KTBS KVOO KWK WBAL WCKY WDAY WEBC WFLA WIBA WIOD WIS WJZ WKY WLS WOAI WREN WRVA WSMB WWNÇ

#### SUNDAY—(Continued)

C - H. V. Kaltenborn

KFAB KFH KLZ KMBC KSCJ KSL KFAB KPH KLZ KMBC KSCJ KSL KTRH KVOR WABC WACO WBCM WBIG WBRC WCAO WDAE WDBJ WDBO WDOD WDRC WDSU WEAN WFBM WFEA WGST WHAS WHP WIBW WICC WIP WISN WKBH WKBN WLBW WLBZ WMT WNAC WNAX WNOX WOKO WORC WPG WQAM WECC WSBT WSFA WSPD WTAR WTOC WWVA

WTAR WTOC WWVA R — James Meiton, Tenor KDYL, KFYR KOA KPRC KSD KSTP KTBS KVOO WBEN WDAF WDAY WEAF WEBC WEEL WFBR WFLA WGY WIBA WIOD WIS WJAR WMAQ WOAI WRVA WSAI WSMB WTAG WWJ WWNC

ED-7:15 p.m., E-6:15, C-5:16, M-4:15 C — Fray and Braggiotti CKOK KFAB KFH KLZ KMBC KSCJ KSL KTRH KVOR WABC WACO WADC WBRC WCAH WCAO WDAE WDBJ WDBO WDOD WDRC

WDAL WDBJ WDBO WDDO WDRC WDSU WEAN WFEL WFBM WFEA WGST WHAS WHEC WHP WHBW WISN WJAS WJSV WLBW WLBZ WMT WNAC WNOX WOKO WORC WMA WSFA WSJS WSPD WTAR WTOC WWVA

ED-7:30 p.m., E-6:30, C-5:30, M-4:30 ED-7:30 p.m., E-6:30, C-5:30, M-4:30 C — Lon Ross and Russian Troupe CKOK KFAB KFH KLRA KLZ KMBC KSCJ KSL KTRH KVOR WABC WACO WADC WBIG WCAH WCAO WCCO WDAE WDBJ WDBO WDOD WDSU WEAN WGR WGST WHEC WHP WIBW WISN WJAS WJSV WKBN WLBW WLBZ WMT WNAC WNAX WNOX WORC WORC WQAM WREC WSBT WSFA WJSS WSPD WTOC WWVA B — Joe Moss and Orchestra

WSPD WTOC WWVA  $R \rightarrow Joe Moss and Orchestra$ WOSH WEAF WJAR WTAG WTIC $<math>B \rightarrow Great Moments in History$ KDKA KDYL KFI KFSD KFYRKGO KGW KHQ KOA KOIL KOMOKPRC KSTP KTAR KVOO KWCRKWK WBAL WBZ WBZA WDAYWEBC WFAA WFLA WGAR WHAMWIBA WIOD WJAX WJDX WJAWIZ WKY WIS WWY WYA WOAWEBC WIAA WIAA WIAA WIAW WIBA WIOD WJAX WJDX WJR WJZ WKY WLS WLW WMC WOAI WPTF WREN WRVA WSB WSM WSMB WTMJ WWNC

ED-7:45 p.m., E-6:45, C-5:45, M-4:45 C — Angelo Patri, Your Child CKOK KMBC KMOX WABC WCAO WCAU WCCO WFBL WGN WGR WHAS WHK WJAS WJSV WKRC WNAC

ED-8:00 p.m., E-7:00, C-6:00, M-5:00 B — Frank Black and Orchestra KDKA KOIL KSO KWCR KWK WBAL WBZ WBZA WCKY WGAR WJZ WLS WMAL WREN WSYR

R — Chase and Sanborn CFCF CKGW KDYL KFI KFSD KFYR KGO KGW KHQ KOA KOMO KPRC KSD KSTP KATR KVOO WBEN WCAE WCSH WDAF WDAY WEAF WEBC WFAA WFBR WFLA WGY WHO WIOD WIS WJAR WJDX WKY WLIT WLW WMAQ WMC WCAL WCO WOW WDC WBY WSM WKY WLIT WLW WMAQ WMC WOAI WOC WOW WRC WSB WSM WSMB WTAG WTAM WTIC WTMJ WWJ WWNC

C — John Henry-River Giant CKOK KLRA KLZ KMBC KRLD KSCJ KSL KTRH KTSA KVOR WABC WACO WADC WBBM WBCM WBRC WBT WCAH WCAO WCCO WAAB WDBJ WDDD WDRC WDSU WFBL WFBM WFEA WGR WGST WHEC WIK WHP WISN WJAS WKBH WLBW WLBZ WNAX WNOX WOKO WORC WREC WSFA WSJS WSPD WWVA

ED-8:15 p.m., E-7:15, C-6:15, M-5:15 C - Andre Kostelanetz Presents C — Andre Kostelanctz Presents CKOK KLZ KMBC KMOX KRLD KSCJ KSL KTRH KTSA KVOR WABC WADC WBBM WBCM WBRC WBT WCAO WCAU WCCO WDAE WDB0 WDOD WDRC WDSU WEAN WFBM WFEA WGR WHCC WHK WIBW WISN WJAS WJSV WKBH WIDW WGR WAAC WALY WCEO WIBW WISN WJAS WJSV WRBH WLBW WIBZ WNAC WNAX WOKO WORC WSBT WSFA WSJS WSPD WTAR WTOC WWVA

ED-8:45 p.m., E-7:45, C-6:45, M-5:45 C — John Henry-River Giant CKOR KLRA KLZ KMBC KRLD KSCJ KSL K7RH KTSA KVOR WABC WADC WBBM WBCM WBRC WDBJ WOOD WDRC WDSU WFBL WPBM WFFA WGR WGST WHEC WHK WHP WISN WJAS WKBH WKBN WLBW WLBZ WNAX WODX WORO WORC WREC WSFA WSJS WSPD WSPD

ED-9:00 p.m., E-8:00, C-7:00, M-6:00 **R** -- Manhattan Merry-Go-Round

 H — Manhattan Merry-Go-Round
 KSD WDAF WEAR WEBR
 WFI WGY WHO WJAR WOC WOW
 WRC WSAI WTIC WWJ
 B — Warden Lawes-Sing Sing
 KDKA KOIL KSO KWCR KWK
 KYW WBAL WBA WBAR WGAR
 WHAM WJR WJZ WLW WREN - The Gauchos

CKOK KFAB KFH KLZ KSCJ KTRH CKOK KFAB KFH KLZ KSCJ KTRH KVOR WAAB WABC WADC WBCM WBRC WBT WCAO WDAE WDBO WDOD WDRC WDSU WEAN WFAN WFBM WGR WHEC WIBW WICC WIP WIBN WJAS WJSV WKBN WLBZ WMBD WNAX WODX WCCO WCO WOAD WEBP WOKO WPG WQAM WSJS WSPD WTAR WTOC

# ED-9:30 p.m., E-8:30, C-7:30, M-6:30 C --- Pennzoil Parade

G – Penntoll Parade CKOK KLRA KMBC KMOX KOMA KTSA WABC WADC WBRC WBT WCAO WCAU WCCO WDRC WBAC WFBL WGN WCR WGST WHAS WHEC WJAS WJSV WKRC WLAC WLBZ WNAC WOKO WSPD R – Album of Familiar Music KDVL KEL KCO. KCW KHO KOA

R — Album of Familiar Music KDYL KFI KGO KGW KHQ KOA KOMO KPRC KSD KSTP KTHS WAPI WBEN WCAE WCKY WCSH WEAF WENR WFAA WFBR WFI WFLA WGY WHO WIOD WJAR WJAX WJDX WKY WMC WOAI WOC WOW WRC WRVA WSAI WSB WSM WSMR WTAG WTAM WTMI WSM WSMB WTAG WTAM WTMJ WWJ

#### - Walter Winchell

KDKA KOIL KSO KWCR KWK KYW WBAL WBZ WBZA WGAR WHAM WJR WJZ WLW WREN

[43]

ED-9:45 p.m., E-8:45, C-7:45, M-6:45 B — Pickens Sisters CFCF CKGW KDKA KOIL KSO KWCR KWK KYW WBAL WHAM

WJR WJZ WREN WSYR

ED-10:00 p.m., E-9:00, C-8:00, M-7:00 - Columbia Revue, See Friday David Lawrence

KDYL KFI KFSD KFYR KGO KGW KHQ KOA KOMO KPRC KSTP KTBS WBEN WCAE WCKY WCSH WDAF WDAY WEAF WEBC WEEI WFBR WFI WFLA WGY WHO WIBA WIOD WIS WJAR WJAX WKY WMC WOAI WOC WRC WSAI WSM WSMB WTAG WTAM WTIC WWI WWNC

## ED-10:15 p.m., E-9:15, C-8:15, M-7:15 R — Highlights and Shadows

CKGW KYW WBEN WCAE WCKY WCSH WDAF WEAF WEEL WFBR WCSH WDAF WEAF WEEL WFBR WFLA WGY WIOD WIS WJAR WOW WRC WSAI WTAG WTAM WWJ WWNC

B — Vincent Lopez; Pratt-Sherman KDKA KDYL KFI KGO KGW KHQ

KOA KOIL KOMO KIPAC KSW KHQ KOA KOIL KOMO KIPAC KSTP KTHS KWK WBAL WBAP WBZ WBZA WGAR WIBA WJDX WJR WJZ WKY WLW WMAQ WOAI WREN WSB WSM WSMB WTMJ

ED-10:45 p.m., E-9:45, C-8:45, M-7:45 R — Sunday at Seth Parker's CFCF CKGW KDYL KF8D KFYR KCHL KGIR KGO KGW KHQ KOA KPRC KS'P KTAR KTBS KTHS KYW WAPI WBAP WBEN WCAE WCKY WCSH WDAF WDAY WEAF WEBC WEEI WFBR WFI WFLA WCY WHO WHAP WHOD WIS WLAP WGY WHO WIBA WIOD WIS WJAR WJAX WJDX WMC WOAT WOO WJAX WJDX WMC WOAI WOC WOW WRC WRVA WSAI WSB WSM WSMB WTAG WTAM WTMJ WWJ WWNC

B — Orange Lantern, Mystery Drama KDKA KSO KWCR KWK WBAL WGAR WHAM WJZ WREN

ED-11:00 p.m., E-10:00, C-9:00, M-8:00 C — Eddie Duchin and Orchestra

C — Eddie Duchin and Orchestra CKOK KPAB KFH KLRA KLZ KMOX KSCJ KTRH KVOR WAAB WABC WBCM WBRC WCAO WCAU WCCO WDAE WDBJ WDBO WDOD WDRC WDSU WEAN WGST WHK WHP WIBW WICC WISN WKBN WLBW WLBZ WMBD WMT WNAC WNAX WNOX WOKO WPG WQAM WIECC WSBT WSJS WSPD WTAR WTOC WTOC

#### ED-11:15 p.m., E-10:15, C-9:15, M-8:15 R — Don Hall Trio

KFYR KSTP WCAE WCKY WCSH WDAF WDAY WEAF WEBC WENR WFBR WF1 WGY WHO WIBA WOC WRC WSAI WTAG WTIC

WRC WSAI WIAG WIAG B – Watter Winchell KDYL KFI KGHL KGIR KGO KGW KHQ KOA KOAO KPRC KTAR KTBS KTHS WAPI WBAP WJDX WKY WMC WOAI WSB WSM WSMB

ED-11:30 p.m., E-10:30, C-9:30, M-8:30 B — Archer Gibson, Organist KDKA KPRC KSO KTBS KWCR KWK KYW WBAL WBAP WBZ WB2A WGAR WHAM WIOD WIS WJAX WJR WJZ WKY WMAS WJAX WJR WJZ WKY WMAS C — Ahe Iwaren Soc Tourder C - Abe Lyman, See Tuesday

## CLASSIFIED INDEX TO CHAIN PROGRAMS

Time in Eastern Daylight Savings

#### CONCERTS

- CONCERTS Howard Barlow, 11:00 p.m., daily, ex. Sat. and Sun., C Boston Symphony, 8:15 p.m., Saturday, B Walberg Brown, 7:00 p.m., daily, ex. Sat. and Sun., R. Concert Footlights, 7:15 p.m., Thursday, B Walter Damrosch, 10:00 p.m., Tuesday, R Gauchos, 9:00 p.m., Sunday, C Gilbert and Sullivan Gems, 10:00 p.m., Saturday, B Gordon String, 6:30 p.m., Sunday, B Grand Opera Miniatures, 9:00 p.m., Monday, C Light Opera Gems, 8:00 p.m., Wednesday, C Walter Logan, 12:30 p.m., Sunday, R New York Philharmonic, 3:00 p.m., Sunday, C Orchestral Gems, 11:30 p.m., Sunday, R

- New Jork Fanlarmone, 5:00 p.m., Sunday, C Orchestral Gens, 11:30 p.m., Sunday, R Radio City Symphony, 12:15 p.m., Sunday, B String Symphoney, 7:30 p.m., Wednesday, B Symphonette, 4:15 p.m., Sunday, B Waldorf-Astoria, 6:00 p.m., daily, ex, Sunday, R

#### DANCE BANDS

- Victor Arden, 2:30 p.m., Sunday, C Charles Barnet, 7:15 p.m., Sauday, C Albert Bartlett, 2:15 p.m., Sauday, C Ben Bernie, 5:00 p.m., and 12:30 a.m., Tuesday, R Don Bestor, 6:00 p.m., Saturday, B Frank Black, 8:00 p.m., Sunday, B; 10:00 p.m., Friday, R Jack Denny, 11:30 p.m., Mon. and Thurs.; 11:10 p.m., Saturday, R

- Saturday, R Clyde Doerr, 2:00 p.m., Sunday, R Eddie Duchin, 11:00 p.m., Sun, 12 mid., Sat., B Joe Green, 2:30 p.m., Sunday, R. 11:00 p.m., Tuesday, B Joe Haynes, 12 mid., Tues.; 11:00 p.m., Tuesday, B Joe Haynes, 12 mid., Tues.; 11:00 p.m., Sat.; 11:30 p.m., Wed., C Richard Himber, 6:30 p.m., Monday, R Johnny Johnson, 12 mid., Saturday, R Mayne King, 3:00 p.m., Sun, 3:30 p.m., Tues., R; 9:30 p.m., Thurs., B Ted Lewis, 11:30 p.m., Mon. and Thurs., C Guy Lombardo, 9:30 p.m., Sun, 7:45 p.m., Sat., B Abe Lyman, 11:30 p.m., Sun, Ties., Fri, 3:45 p.m., Tues.,

- Abe Lyman, 11:30 p.m., Sun., Tues., Fri.; 8:45 p.m., Tues., Wed., Thurs., C Wed., Thurs., C Dick Mansfield, 6:00 p.m., Wednesday, C Dolph Martin, 7:30 p.m., Mon., Wed., Fri., C Joe Moss, 7:30 p.m., Sunday, R Ozzie Nelson, 6:15 p.m., Thurs; 7:30 p.m., Sat., C George Olsen, 8:00 p.m., Wednesday, R Will Osborne, 12 mid., Sunday, R Ben Poliket, 12 mid., Sunday, R; 12:30 a.m., Sat., B Willard Robison, 9:30 p.m., Tuesa, R; 12:30 a.m., Sat., B Willard Robison, 9:30 p.m., Saturday, R Harokl Stern, 11:30 p.m., Saturday, R Harokl Stern, 11:30 p.m., Saturday, R Paul Tremaine, 6:15 p.m., Saturday, R Fred Waring, 10:00 p.m., Wednesday, C **DIALOG**

#### DIALOG

- DIALOG Amos 'n' Andy, 7 and 11 p.m., daily, ex. Sat. and Sun., B Phil Baker, 9:30 p.m., Friday, R Burns and Allen, 9:30 p.m., Wednesday, C Irvin S. Cobb, 9:00 p.m., Wed. and Fri., C Phil Cook, 8:45 p.m., Mon. and Wed., B Cuekoo, 10:30 p.m., Saturday, B Easy Aces, 9:00 p.m., Tues., Thurs., Sat., C George Givot, 10:00 p.m., Wednesday, C Tom Howard, 9:00 p.m., and 12:30 a.m., Friday, R Marx Brothers, 7:30 p.m., Monday, B Baron Munchausen, 10:00 p.m., Thursday, R Jack Osterman, 2:30 p.m., Sunday, C Drs. Pratt and Sherman, 10:15 p.m., Sunday, R Reis and Duni, 6:00 p.m., Thursday, C Stoopnagle and Budd, 9:30 p.m., Thursday, C Vic and Sade, 10:15 p.m., Tues, Wet, Thurs, Fri., B DRAMA

#### DRAMA

- Octavus R. Cohen Mystery, 7:15 and 11:15 p.m., Mon., Wed., Sat., B Death Valley Days, 9:00 p.m., Thursday, B

Eno Crime Clues, 8:00 p.m., Tuesday and Wednesday, B First Nighter, 9:00 p.m., Friday, B Foreign Legion, 10:00 p.m., Thursday, C Fu Manchu Mystery, 8:30 p.m., Monday, C Goldbergs, 7:45 p.m., daily, ex. Sat. and Sun, R John Henry, 8:00 and 8:45 p.m., Sunday, C Sherlock Holmes, 9:00 p.m. and 12:15 a.m., Wednesday, B K-7 9:30 n.m. Monday R Sherock Holmes, 9500 p.m. and 1215 a.m., Wednesday, B. K-7, 9:30 p.m., Monday, R. Magie Voice, 8:15 p.m., Tuesday and Saturday, C Moonshine and Honeysuckle, 1:30 p.m., Stunday, R Mort and Marge, 7:00 and 10:45 p.m., daily, ex. Sat. and Sun., C Sun., C. Sun., C. Sunday, B. Pages of Romance, 5:30 p.m., Sunday, B. Pages of Romance, 5:30 p.m., Sunday, B. Rin Tin Tin, 8:30 p.m., Thursday, B. Buck Rogers, 7:15 p.m., daily, ex. Sat. and Sun., C. Roses and Drums, 5:00 p.m., Sunday, C. The Shadow, 8:30 p.m., Wednesday, R. Soconyłand Sketches, 8:00 p.m., Monday, R.

#### PIANO AND ORGAN

Fray and Braggiotti, 7:15 p.m., Sun; 9:15 p.m., Thurs. C Archer Gibson, 11:30 p.m., Sunday, B Vee Lawhurst, 4:15 p.m., Sunday, R Josef Lhevinne, 9:30 p.m., Wednesday, R Ohman and Ardon, 2:30 p.m., Sun, C; 9:30 p.m., Sun, R Sheffter and Gould, 5:15 p.m., Sunday, R

#### POPULAR PROGRAMS

POPULAR PROGRAMS A. & P. Gypsies, 9:00 p.m., Monday, R Album of Famillar Music, 9:30 p.m., Sunday, R Armour Program, 9:30 p.m., Friday, B Blue Coal Revue, 5:30 p.m., Sunday, C Major Bowes' Family, 11:15 a.m., Sunday, R California Melodies, 9:30 p.m., Tuesday, C Chase and Sanborn, 8:00 p.m., Sunday, R Chevrolet Program, 10:00 p.m., Friday, R Cities Service, 8:00 p.m., Monday, R Contented Program, 10:00 p.m., Monday, R Contented Program, 10:00 p.m., Monday, R Contented Program, 10:00 p.m., Monday, R Cont Cob Pipe Club, 10:00 p.m., Monday, R Evening in Paris, 9:30 p.m., Monday, C Five Star Theatre, 10:00 p.m., Monday, B Golden Country Club, 10:00 p.m., Monday, B Golden Country Club, 10:00 p.m., Monday, B Golden Country Club, 10:00 p.m., Tuesday, B Household Musical Memorics, 9:00 p.m., Tuesday, B Inside Story, 9:30 p.m., Friday, C Gottman Band, 3:00 p.m., Sunday, B Household Musical Memorice, 9:00 p.m., Tuesday, B Inside Story, 9:30 p.m., Friday, C Kaltennyer's Kindergarten, 8:00 p.m., Saturday, R Lucky Strike, 10:00 p.m., Thursday, R Manhattan Merry-Go-Round, 9:00 p.m., Sunday, C Maxwell House, 9:00 p.m., Thursday, R Borrah Minevitch, 7:00 p.m., Sunday, B Musical Album, 8:00 p.m., Tuesday, C Nestle's Program, 8:00 p.m., Friday, B Old Gold, 10:00 p.m., Wednesday, C Pennzoil Parade, 9:30 p.m., Friday, R Richfield Country Club, 10:30 p.m., Studay, R Royal Vagabonds, 8:00 p.m., Wednesday, R Royal Vagabonds, 8:00 p.m., Wednesday, R Kichfield Country Club, 10:30 p.m., Studay, C Saturday Frivolities, 9:45 p.m., Saturday, C Sinclair Minstrels, 9:00 p.m., Monday, B Swift's Garden, 5:30 p.m., Sunday, R Wildroot Institute, 4:15 p.m., Sunday, R Ed Wynn, 9:30 p.m., Tuesday, R Ed LGIOUS

#### RELIGIOUS

Dr. S. Parker Cadman, 3:30 p.m., Sunday, R Cathedral Hour, 6:30 p.m., Sunday, C Catholic Hour, 6:00 p.m., Sunday, R Church of the Air, 1:00 p.m., Sunday, C Mid-Week Hymn Sing, 6:30 p.m., Tuesday, R National Vespers, 5:00 p.m., Sunday, B National Youth Conference, 4:30 p.m., Sunday, B Seth Parker's, 10:45 p.m., Sunday, R Pilgrims, 2:15 p.m., Sunday, R Salt Lake Choir, 12 noon, Sunday, C

#### SINGERS

SINGERS
Countess Olga Albani, 6:45 p.m., Mon. and Thurs., R
Frances Alda, 6:00 p.m., Tuesday, R
Elvia Allman, 7:30 p.m., Mon., Wed. and Sat., R
etty Barthell, 10:00 p.m., Mon., 6:15 p.m., Jues.; 8:00
p.m., Fri., C; 10:30 p.m., Fri., R
Boswell Sisters, 10:30 p.m., Thurs.; 9:15 p.m., Sat., C
Fanny Brice, 8:00 p.m., Thurs.; 6:00 p.m., Fri., C
Garles Carlie, 10:45 p.m., Tues., and Thurs., C
Do Re Mi, 8:00 p.m., Thurs.; 6:00 p.m., Fri., C
Jessica Dragonette, 8:00 p.m., Friday, R
Mary Eastman. 9:00 p.m., Mont.; 8:15 p.m., Sun., C
Evan Evans, 8:00 p.m., Thurs., 6:00 p.m., Fri., C
Jessica Dragonette, 8:00 p.m., Friday, R
Mary Eastman. 9:00 p.m., Mont.; 8:15 p.m., Sun., C
Evan Evans, 8:00 p.m., Thurs., 6: 9:00 p.m., Friday, R
Don Hall Trio, 11:15 p.m., Sunday, R
Tring Kaufman, 8:45 p.m., Tues., Wed., Thurs., C
Keller, Sargent and Ross, 7:30 p.m., Tues. and Thurs., C
Jeaunie Lang, 9:30 p.m., Thurs., 6: 9:00 p.m., Friday, R
Don Hall Trio, 11:5 p.m., Friday, B
Dittle Jack Little, 10:45 p.m., Wednesday and Friday, C
Smiling Ed McConnel, 2:00 p.m., Sunday, C
Jamaes Meiton, 7:00 p.m., Sunday, C
Jamaes Meiton, 7:00 p.m., Sunday, B
Grange McLaughlin, 9:15 p.m., Tuesday, C
Jamaes Meiton, 7:00 p.m., Sunday, B
Grande Noyas, 9:30 p.m., Thurs., (5:40 p.m., Stat., C
Donareh Mystery Tenor, 2:00 p.m., Sunday, C
Jamaes Meiton, 7:00 p.m., Sunday, B
Grande Noyas, 9:30 p.m., Thurs., (5:45 p.m., Med., 10:00 p.m.,
Thurs., 10:00 p.m., Wednesday and Friday, C
Jamaes Meiton, 7:00 p.m., Sunday, B
Grande Noyas, 9:30 p.m., Thurs., 10:45 p.m., Stat., C
Donareh Mystery Tenor, 2:00 p.m., Sunday, C
Jamaes Meiton, 7:00 p.m., Sunday, B
Grande Noyas, 9:30 p.m., Thurs., 10:45 p.m., Stat., C
Donareh Mystery Tenor, 2:00 p.m., Sunday, B
Grande Noyas, 9:30 p.m., Thurs., 10:45 p.m., Stat., C
Donareh Mystery Tenor, 2:00 p.m., Sunday, B
Grande Noyas, 9:00 p.m., Thurs., B, 10:00 p.m., Thurs., 10:45 p.m., Stat., C
Donareh Mystery Tenor, 2:00 p.m., Sunday, B
Grande Noyas, P, Friday, C
Herekens Sisters, 9:45 p.m., Mednesday, C
Herekens Sisters, 9:45 p.m., Munday, C

- Sixteen Male Voices, 11:30 p.m., Wednesday, B Kate Smith, 8:30 p.m., Tues., Wed., Thurs., C Southern Singers, 6:45 p.m., Sat., R; 11:00 p.m., Mon., Thurs.; 8:45 p.m., Tuesday, B Southernaires, 11:00 p.m., Tuesday, R Street Singer, 12:45 p.m., Sunday; 7:45 p.m., Sat.; 10:30 p.m., Fri., C Tacuwaet leafers, 8:30 p.m. Wednesday, B
- p.m., Fri., G Tastycast Jesters, 8:30 p.m., Wednesday, B Three Keys, 6:30 p.m., Thursday, R Three X Sisters, 6:30 p.m., Mon., Wed., Fri., B Ranny Weeks, 8:45 p.m., Mon.; 9:00 p.m., Wed. and Sat., R Women's Octet, 11:15 p.m., Tuesday, B

#### TALKS

- America's Grub Street, 6:00 p.m., Saturday, C American Taxpayers' League, 7:00 p.m., Saturday, B Boake Carter, 7:45 p.m., daily, ex. Sat. and Sun., C Cook Travelogues, 1:15 p.m., Sunday, B Jack Dempsey, 6:30 p.m., Mon., Tues., Wed., C William Hard, 6:30 p.m., Wedneeday, R Edwin C. Hill, 10:30 p.m., Mon., Tues., Wed.; 9:30 p.m., Ev. C Fri., C Horlick's Health, 8:30 p.m., Tues. and Fri., B
- H. V. Kaltenborn, 7:00 p.m., Sunday; 6:00 p.m., Thurs., C Warden Lawes, 9:00 p.m., Sunday, B

- David Lawes, 9,00 p.m., Sudday, B David Lawrence, 10:00 p.m., Sudday, R Laws That Safeguard, 6:30 p.m., Staturday, B Lawser and Public, 6:00 p.m., Sudday, C Alex Morrison on Golf, 10:00 p.m., Mon., C; 10:30 p.m. Fri., R

- Fri., R National Radio Forum, 10:30 p.m., Monday, R Angelo Patri, 7:45 and 11:15 p.m., Sunday, C Sigmund Spaeth, 10:00 p.m., Tuesday, B Lowell Thomas, 6:45 p.m., daily, ex. Sat. and Sun., B; 5:00 p.m., Sunday, R Merle Thorpe, 7:15 p.m., Saturday, B Howard Thurston, 8:45 p.m., Thurs. and Fri., B Carveth Wells, 10:30 p.m., Wednesday, R Frederic William Wile, 7:00 p.m., Saturday, C Walter Winchell, 9:30 and 11:15 p.m., Sunday, B

DELETED

## IMPORTANT NOTICE

Too late for us to make the changes in this issue, the Canadian Radio Com-mission is making what may be wholesale shifts of frequencies among the stations in Eastern Canada. CFCY is moved from 580 to 630; CHCK from 960 to 1310; CNRO from 600 to 880; and CKCO from 890 to 1010. There are probably a number of other changes most of which will go into effect on April 16th.

## THE MONTH'S CHANGES

#### POWER

$\begin{array}{c} 680 \\ 750 \\ 810 \\ 855 \\ 880 \\ 890 \\ 900 \\ 1150 \\ 1190 \\ 1195 \\ 1430 \end{array}$	CMAF VOWR VOAS XEFD KLX VOGY OMX WLBL WHAM WSAZ VONF WBAK	Hayana, Cuba, 500 to 1000 St. John's, Nfid., 750 to 500 St. John's, Nfid., 200 to 75 Tijuana, Mex., 300 to 2500 Oakland, Calif., 500 to 1000 St. John's, Nfid., 500 to 100 Hayana, Cuba, 500 to 750 Stevens Point, Wis, 2000 to 2500 Rochester, N. X., 5000 to 25000 Huntington, W. Va., 250 to 500 Huntis, Nfid., 500 to 100 Harrisburg, Pa., 500 to 1000	$588 \\ 893 \\ 925 \\ 950 \\ 965 \\ 1000 \\ 1325 \\ 1360 \\ 1450 \\ 1200 \\ 1280 $	CMDD VOGT CMDE VONA CMAY XETC CMCX CMBF XEFH WNJ WBBX WTNJ	Havana, Cuba Wabana, Nfid. Havna, Cuba St. John's, Nfid. Havana, Cuba Jalapa, Mex. Havana, Cuba Havana, Cuba Mexico City, Mex. Newark, N. J. <b>CALLS</b> New Orleans, La., from WABZ Treuton, N. J., from WABZ
600 855 890 910 930 1120 1190 1290	CMW XEFD VOGY CFCH CKPC CHLP WSAZ XFB	FREQUENCY Havana, Cuba, from 590 Tijuana, Mex., from 1020 St. John's, Nfd., from 860 No. Bay, Out., from 930 Preston, Ont., from 580 Montreal, Que., from 1200 Huntington, W. Va., from 580 Jalapa, Mex., from 840	1300 710 1310 1370	VOKW KMPC KGCX WLEY	NEW St. John's, Nfld. OWNERS Beverly Hills. Cal., to Beverly Hills Broadcasting Corp. Wolf Point, Mont., to E. E. Krebsbach Lexington, Mass., to Albert S. Moffat

#### 1370 WLEY

[45]

This Index will not appear again in its present form and readers are urged to preserve this list. It will prove a great aid in identifying stations heard. Night power in watts in second column. Odd frequencies shown in parenthesis.

540 1	kilocy	cles	555.2	meters				
скок	5000		roadcaster nal Statio		anty Trust B	ldg., Windso	r, Ont.	"The Inter
XEY	105				Merida, Yuo	atan, Mex.	(546.8)	
550 1	kilocy	cles	545.1	meters				
KFDY	1000	South I	Dakota Sta	te College. B	rookings, S. I	Dak.		
KFUO	1000	Evange	lical Luthe	ern Church, I	Aissouri Syno dia Theologic	d, 801 DeMu		t. Louis, Mo
KFYR	1000				roadway, Bisi			2)
KOAC	1000				ege, Corvallis			
KSD	500	Pulitze	r Publishii	ng Co., 12th a	and Olive Sts.	, St. Louis, I	Mo. (Rec	i)
WDEV	500				, Waterbury, ecord) NNRC		"Waterb	oury Delight
WGR	1000				nd Bldg., Bu		(CBS).	
WKRC	1000				innati, Ohio.			

#### 560 kilocycles 535.4 meters Sabine Broadcasting Co., In., Beaumont Hotel, Beaumont, Voice of the Sabine District." KFDM 500 Tex. "The Voice of the Sabine District." The Reynolds Radio Co., Inc., Shirley-Savoy Hotel, Denver, Colo. "Pioneer of the West." (CBS). Associated Broadcasters, Inc., Fifth and Mission Sts., San Francisco, Calif. "At the Top of the Dial" (On the Pickwick Hotel). WFI Broadcasting Co., 801 Market St., Philadelphia, Pa. (Red). Nelson Bros. Bond & Mortgage Co., 134 N. LaSalle St., Chicago, Ill. "At the Top of the Dial." Lit Bros. Broadcasting System, Inc., Market at 8th St., Philadelphia, Pa. (Red). KLZ 1000 KTAB 1000 WFI 500 WIBO 1000 WLIT 500 (Red). WNOX Inc., Andrew Johnson Hotel, Knoxville, Tenn. "The Gateway of the Great Smokies." (CBS). North Shore Congregational Church, 1011 Wilson Ave., Chicago, Ill. "We Preach Christ Crucified; We Proclaim Christ's Coming; We Praise Christ Continuently." WNOX 1000 WPCC 500 Continually. Miami Broadcasting Co., 325 North East First Ave., Miami, Fla. "The Voice of Tropical America." (CBS). 7.5 Luis L. Castro, Mexicali, B. C., Mexico. WOAM 1000

XEAO

#### 570 kilocycles 526.0 meters

HIX	1000	The Dominican Government, 27 de Febrero, Santo Domingo, Dominican
VOVO	350	Republic. (579).
KGKO	250	Wichita Falls Broadcasting Co., Cor. 9th St. and Indiana Ave., Wichita Falls, Texas.
KMTR	<b>50</b> 0	KMTR Radio Corp., 915 N. Formosa St., Hollywood, Calif. (United Artists
		Theatre).
KVI	500	Puget Sound Broadcasting Co., Inc., Tacoma Hotel, Tacoma, Wash. (CBS).
WEAO	1000	Ohio State University, North High Street, Columbus, Ohio.
WKBN	500	WKBN Broadcasting Corp., Y. M. C. A. Building, Youngstown, Ohio. (CBS).
WMCA	500	Knickerbocker Broadcasting Co., Inc., 1697 Broadway, New York, N. Y.
WNAX	1000	The House of Gurney, Inc., Second and Capitol Sts., Yankton, S. D. (CBS).
WNYC	500	City of New York, Dept. of Plants and Structures, Centre and Duane Sts.,
		New York, N. Y. "Municipal Broadcasting Station." (On Municipal
		Building).
WEVD	250	Central New York Broadcasting Corn East Onondage and S. Warren Sts

WSYR Central New York Broadcasting Corp., East Onondaga and S. Warren Sts., Syracuse, N. Y. (Hotel Syracuse). (Blue). Citizens Broadcasting Co., Inc., 815 Flatiron Bldg., Asheville, N. C. "WWNC Broadcasting from the Land of the Sky." (NBC).

WWNC 1000

#### 516.9 meters 580 kilocycles

CFCY	500	Island Radio Broadcasting Co., Ltd., 143 Great George St., Charlottetown,
		P. E. I. "The Voice of the Maritimes." (On Canadian National Hotel).
CHMA	250	Christian and Missionary Alliance, 98th St. and 107th Ave., Edmonton,
		Alberta.
CKCL	500	The Dominion Battery Co., 104 University Ave., Toronto, Ontario.
CKUA	500	University of Alberta, Edmonton, Alberta. (Studio in Extension Dept.
		Building).

CMW	1 400	Troncoso y Gil, Paseo de Marti, 103, Havana, Cuba. "The Voice of the Antilles."
KMJ	500	McClatchy Radio Stations, Van Ness and Calveras Sts., Fresno, Calif. (Fresno Bee). (CBS).
KSAC	500	Kansas State College of Agriculture and Applied Science, Nichols Gym- nasium, Manhattan, Kans. "This is the Voice of Kansas State."
WDBO	250	Orlando Broadcasting Co., Inc., 555 N. Orange Ave., Orlando, Fla. "The Voice of Central Florida." (Fort Gatlin Bldg.) (CBS).
WIBW	1000	Topeka Broadcasting Assn., Inc., 1100 National Reserve Bldg., Topeka, Kans. (CBS).
WOBU	250	WOBU, Inc., Hotel Ruffner, Charleston, W. Va.
WTAĞ	250	The Worcester Telegram Publishing Co., Inc., 20 Franklin St., Worcester, Mass. "The Worcester Telegram and Evening Gazette." NNRC tips. (Red).
XEPN	100000	Cia Radiodifusora de Pedras Negras S. A., Pedras Negras, Coah., Mexico. (Mail address: Yolanda Hotel, Eagle Pass, Texas). (585).

## 590 kilocycles 508.2 meters

CIGC	5000	London Free Press Printing Co., Ltd., Richmond St., London, Ont. (595).
KHO	1000	Louis Wasmer, Inc., Sprague Ave. and Post St., Spokane, Wash. (NBC).
KHQ WCAJ	500	Nebraska Wesleyan University, 50th and St. Paul Sts., Lincoln, Neb.
WEEL	1000	The Edison Electric Illuminating Co. of Boston, 182 Tremont St., Boston,
		Mass. "The Friendly Voice." (Red).
WKZO	1000	WKZO, Inc., 301-302 Peck Bldg., Kalamazoo, Mich. "Voice of Southwestern
		Michigan." (On the Burdick Hotel).
WOW	1000	Woodmen of the World Life Insurance Assn., 14th and Farnam Sts., Omaha,
		Neb. (Red).

## 600 kilocycles 499.7 meters

CNRO	500	Canadian National Railways, Chateau Laurier Hotel, Ottawa, Ont. "CNRO in Ottawa, the Capital of Canada."
KFSD	1000	Airfan Radio Corp., 326 Broadway, San Diege, Calif. (On the U. S. Grant Hotel). (NBC).
WCAC	250	Connecticut Agricultural College, Storrs, Conn.
WCAO	250	The Monumental Radio Co., 811 W. Lanvale St., Baltimore, Md. "The Voice of Baltimore." (CBS).
WICC	250	Bridgeport Broadcasting Station, Inc., Hotel Garde, New Haven, Conn. (CBS). (Also Stratfield Hotel, Bridgeport, Conn.)
WMT	500	Waterloo Broadcasting Co., 3rd and Lafayette Sts., Waterloo, Iowa. "The Voice of Iowa." (CBS).
WREC	500	WREC, Inc., Peabody Hotel, Memphis, Tenn. (CBS).

## 610 kilocycles 491.5 meters

KFRC	1000	Don Lee Broadcasting System, Inc., 1000 Van Ness Ave., San Francisco,
KZRM	50000	Calif. (CBS). Erlanger & Galinger, Inc., 601 Escolta, Manila, P. I. "This is KZRM, Radio
	00000	Manila," (Atop Insular Life Bldg.) (618.5).
WDAF	1000	The Kansas City Star Co., 1729 Grand Ave., Kansas City, Mo. (On the Star
		Building). (Red).
WIP	<b>5</b> 0 <b>0</b>	Pennsylvania Broadcasting Co., 8th and Market Sts., Philadelphia, Pa.
		"Philadelphia's Pioneer Voice." (CBS).
WJAY	500	Cleveland Radio Broadcasting Corp., Starr Piano Bldg., Cleveland, Ohio.
XĚTR	1000	Cia Difusora Mexicana S. A., Mexico City, Mexico.

# 620 kilocycles 483.6 meters

KGW	1000	Oregonian Publishing Co., 325 Alder St., Portland, Ore. (NBC).
KTAR	500	KTAR Broadcasting Co., 116 N. Central Ave., Phoenix, Ariz. "Atop the
		Heard Building." (NBC).
WFLA	1000	Florida Westcoast Broadcasting Co., Inc., Chamber of Commerce Bldg.,
		Clearwater, Fla. "WFLA, Where It's Springtime." (Also Hillsboro
		Hotel, Tampa, Fla.) (NBC).
WLBZ	500	Maine Broadcasting Co., Inc., 100 Main St., Bangor, Maine. "The Maine
	0.0.0	Station from Maine People." (CBS).
WSUN	1000	The Chamber of Commerce, St. Petersburg, Fla. "The Sunshine City."
	1000	(Same as WFLA). (NBC).
WTMJ	1000	The Journal Co., 333 West State St., Milwaukee, Wis. (NBC).
	1000	
630 12	1000	cles 475.9 meters
UJU K	nucv	

## 630 kilocycles 475.9 meters

CFCT	500	Victoria Broadcasting Assn., Union Bldg., 612 View St., Victoria, B. C. "Th
		Canadian Radio Station Farthest West." (On the Bank of Toronto Bldg
CJGX	500	Winnipeg Grain Exchange, 188 Grain Exchange Bldg., Winnipeg, Mar (Station located in Yorkton, Sask.)

CKOC	1000	Wentworth Radio Broadcasting Co., Ltd., Royal Connaught Hotel, Hamilton, Ont. "The Voice of Hamilton." (635).
CKTB	1000	Wentworth Radio Broadcasting Co., Ltd., Welland House, St. Catharines, Ont. "The Garden City Station." (635).
CMCU	150	Jorge Garcia Serra, San Francisco No. 13, Vibora, Havana, Cuba.
CMO	250	Jose Fernandez, 25 Numero 445, Vedado, Havana, Cuba.
CNRA	700	Canadian National Railways, Moncton, N. B.
KFRU	500	KFRU, Inc., Columbia, Mo. "The Heart of Missouri."
KGFX	200	Dana McNeil, 510 Summit Ave., Pierre, S. D.
WGBF	500	Evansville On the Air, Inc., 618 <sup>1</sup> / <sub>2</sub> Main St., Evansville, Ind. "The Voice of
		the Tri-States."
WMAL	250	National Broadcasting Co., Lessee, 712 Eleventh St., N. W., Washington, D. C. (Blue).
wos	500	State Marketing Bureau of Missouri Board of Agriculture, Jefferson City, Mo.
XETF	500	Manuel Angel Fernandez, Independencia St., Veracruz, Mex. "La Voz de Veracruz, El Primer Puerto de Mexico."
XFG	2000	Secretaria de Guerra y Marina, Mexico City, Mexico. (638.3).

640	kilocy	cles 468.5 meters
CHIRC	100	CHRC, Ltd., Victoria Hotel, Quebec, Que. (645).
CKCI	100	Le "Soleil" Ltd., Quebec, Que. (645).
CKCR	100	Mitchell & Liddle, K. W. Broadcasting Co., 24 King St., South, Waterloo
		Ont. "Voice of the Twin Cities." (On the Walper House). (645).
KFI	50000	Earle C. Anthony, Inc., 1000 So. Hope St., Los Angeles, Calif. '"E. C. A. Inc.,
		Distributor of Packard and Hudson-Essex Motor Cars for California."
		(NBC).
WAIU	500	Associated Radiocasting Corp., Deshler-Wallick Hotel, Columbus, Ohio
		"The Voice of Ohio." (On the A. I. O. Citadel),
WOI	5000	Iowa State College, State College of Agriculture, Ames. Iowa

65(	) ki	locycles	<b>5</b> 461.	.3 me	ters
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 KPCB
 100
 Queen City Broadcasting Co., Tower Bldg., 3rd and Pine Sts., Seattle, Wash.

 WSM
 50000
 The National Life & Accident Insurance Co., Inc., 301 Seventh Ave. No., Nashville, Tenn. "We Shield Millions." (NBC).

## 660 kilocycles 454.3 meters

CHWK	100	Chilliwack Broadcasting Co., Ltd., Wellington Ave., Chilliwack, B. C. "The Voice of Fraser Valley." (665).
CJRM CJRW	$\begin{array}{c} 500 \\ 1000 \end{array}$	James Richardson & Sons, Ltd., Moose Jaw, Sask. (665). James Richardson & Sons, Ltd., Royal Alexandra Hotel, Winning, Man.
RUS	500	(Station in Fleming, Sask.) (665). Republic of El Salvador, Direccion General de Correos y Telegraphos, San Salvador, C. A. (664).
WAAW	500	The Omaha Grain Exchange, 19th and Harney Sts., Omaha, Neb. "The Pioneer Farm Market Station of the West."
WEAF XEM	50000 500000	National Broadcasting Co., Inc., 711 Fifth Ave., New York, N. Y. (Red). Gumaro Lizarraga, Matamoros, Tams., Mexico.

## 670 kilocycles 447.5 meters

WMAQ 5000 WMAQ, Inc., Op. by N. B. C., Merchandise Mart, 222 N. Bank Drive, Chicago, III. "Chicago Daily News Broadcasting Station." (NBC).

# 680 kilocycles 440.9 meters

CMAF	1000	International Broadcasting Co., Primera y 8, Reparto Miramar, Havana,
		Cuba. (P. O. Box 66).
HJN	2000	Government of Columbia, Bogota, Colombia, (685).
KFEO	2500	Scroggin & Co. Bank, Robidoux Hotel, St. Joseph, Mo.
KPO `	5000	National Broadcasting Co., Inc., 111 Sutter St., San Francisco, Calif. (NBC).
VAS	2000	The Canadian Marconi Co., Glace Bay, N. S. "The Voice of the Atlantic
		Seaboard." (685).
WPTF	1000	The Durham Life Insurance Co., 324 Fayetteville St., Raleigh, N. C. "We
	1000	Protect The Family." (On Sir Walter Hotel). (NBC).
		(on Sir Walter Hotel). (HBC).

## 690 kilocycles 434.5 meters

CFAC	500	Calgary Herald, Ltd., Herald Bldg., Calgary, Alta.
CFRB	10000	Rogers-Majestic Corp., Op. by Canadian Radio Corp., 37 Bloor St. West.
		Toronto, Ont. "The Rogers Batteryless Station, CFRB, Toronto," (CBS).
CJCJ	500	The Albertan Publishing Co., Ltd., 9th Ave. and 2nd St. West, Calgary, Alta.
CJCJ NAA	1000	The United States Navy, Arlington, Va. (Time Signals).
XET	500	Cadena Radiodifusora, Mexicana, S. A., P. O. Box 203, Hidalgo, Monterrey,
		N I Mexico (Hotel Angiro)

I	NDEX BY FREQ	UENCIES A	ND DIAL N	UMBERS
700 kiloc	ycles 428.3 1	neters		
WLW 50000	Crosley Radio Corp Station.'' (NBC)	., 1329 Arlingto	on St., Cincinna	ti, Ohio. "The Nation's
710 kiloc	ycles 422.3 1	meters		
KMPC 500 WOR 5000 XEN 1000		dcasting Corp., Isting Service, S. A., Op. by Fo Mexico. (711).	9631 Wiltshire B Inc., 147 Market rnando Ortiz M "Radiomundia	lvd., Beverley Hills, Calif St., Newark, N. J. onesterio, Avenida Juarez II, The Voice of Mexico.'
720 kiloc	ycles 416.4 1	neters		
WGN 25000	-	117 Tribune To n the Drake Ho	wer, Chicago, Illotel). (CBS).	. "The World's Greatest
730 kiloc		meters		
CHLS 100 CHYC 5000 CKAC 5000	W. G. Hassell, Victo Northern Electric ( LaPresse Publishin (CBS).	ory Square, Var Co., Ltd., Mon g Co., Ltd., 98	ncouver, B. C. ( treal, Que. 0 St. Catherine	Province Bldg.) St., W., Montreal, Que
CKCD 100 CKFC 50	Vancouver Daily Pr	Canada, 12th	Ave. and Hemlo	eck St., Vancouver, B. C e St.)
CKMO 100 CKWX 100		Co., Room 160 ng Co., Ltd., 80	4, Bekins Bldg., 1 W. Georgia St.	e St.) Vancouver, B. C. Vancouver, B. C. (Hote
CMK 3150	Georgia). National Broadcast the Hotel Plaza).		a, Senargura No	o. 1, Havana, Cuba. (Or
XEF- XER 75000			, Apartado Posta P. O. Box 1083 Nations.'' (735)	l Numero 30, Villa Acuna , Del Rio, Texas). "The
740 kiloc	vcles 405.2 1	meters		
CJCA 500	Edmonton Journal with studios in t M. M. Johnson Co	he McGee Bldg	. St., Edmonto ., Edmonton."	on, Alta. "This is CJCA (745).
KMMJ 1000				
WSB 5000 WHEB 250	South." (NBC). Granite State Broad	dcasting Corp., 3	39 Congress St., I	Ga. "The Voice of the P. O. Box 213, Portsmouth
750 1-11-0		an of one		1
750 kiloc KGU 2500	The Advertiser Pu	meters	Capiolani Blvd	at South St. Hopolulu
KGU 2500 VOWR 500	Hawaii. "The V Wesley United Chu	oice of Hawaii. arch, P. O. Box	' (NBC). 157, St. John's,	Nfld. "We Serve."
WJR 10000 XEAN 5000	WJR, The Goodwill Goodwill Station Radiodifusora Natio	l Station, Inc., .'' (On the Fis onal, S. A., Hote	2800 Fisher Blo sher Bldg.) (Blu l Rio Bravo, Jua	at South St., Honolulu Nfld. "We Serve." Ig., Detroit, Mich. "The rez, Chih., Mexico. (Mai The Voice of Mexico."
ALAN 0000	address: 1222 M	ills Bldg., El P	aso, Texas). "T	he Voice of Mexico."
760 kiloc	ycles 394.5 1	meters		
KXA 250 WBAL 10000	American Radio To (See 1060 kcys.) U	el. Co., 218 Bige Ises 760 kcys. fo	low Bldg., Seatt r Blue programs	le, Wash. 5 in synchronization with
WEW 1000 WJZ 50000	WJZ). St. Louis Universit	v. 221 N. Grand	Blvd., St. Lou	
770 kiloc		meters		
KFAB 5000	Cornhusker), (C	BS).		oln, Neb. (On the Hote
WBBM 25000	WBBM Broadcastir	ng Corp., Wrigle	ey Bldg., Chicage	o, III. (CBS).
780 kiloc		meters		
CKY 5000	Manitoba Telephor Enrique Artaleio	· · · ·	1 . 1 . 0	And the Address of th

CMBS 150 Enrique Artalejo, Calzada y H. St., Vedado, Havana, Cuba. CMCQ 1000 Andres Martinez, Vista Alegre No. 80, Vibora, Havana, Cuba.

KELW	500	Magnolia Park, Ltd., 3702 Magnolia Park Blvd., Burbank, Calif. "Voice of the San Fernando Valley."
ктм	500	Pickwick Broadcasting Corp., Ltd., 214 S. Vermont Ave., Los Angeles, Calif. (Rainbow Gardens Ballroom).
WEAN	500	Shepard Broadcasting Service, Inc., Crown Hotel, Providence, R. I. (CBS).
WMC	500	Memphis Commercial Appeal, Inc., Hotel Gayoso, Memphis, Tenn. "Down in Dixie." (NBC).
WPOR	500	WTAR Radio Corp., Wainwright Bldg., Norfolk, Va. (WPOR is used when broadcasting from Portsmouth, Va.)
WTAR	500	WTAR Radio Corp., Wainwright Bldg., Norfolk, Va. (CBS).
XEP	1000	Cia Difusora de Mexico, S. A., Mexico City, Mexico.

## 790 kilocycles 379.5 meters

CMHC	250	Frank H. Jones, Tuinucu, Cuba.
CMJK	300	Compania Cubana Nacional de Radio, S. A., Apartado 320, Camaguey, Cuba
•		"LaVoz de 'El Camagueyano'."
KGO	7500	General Electric Co., Op. by NBC, 111 Sutter St., San Francisco, Calif. (NBC).
WGY	50000	General Electric Co., 1 River Road, Schenectady, N. Y. (Studios in the DeWitt
		Clinton Hotel, Albany, N. Y.) (Red).

### 800 kilocycles 374.8 meters

WBAP	50000	Carter Publications, Inc., 400 West 7th St., Fort Worth, Tex. (On the Black	-
		stone Hotel). Rings Cowbell signing off and on. (NBC).	
WFAA	50000	The Dallas News-Dallas Journal, Baker Hotel, Dallas, Texas. (NBC).	

## 810 kilocycles 370.2 meters

CHNS	500	Halifax Herald, Op. by Maritime Broadcasting Co., Ltd., P. O. Box 998, Halifax, N. S. "The Key Station of the Maritime." (Lord Nelson Hotel). (815).
CNRH	500	Canadian National Railways, Halifax, N. S. (On the Nova Scotian Hotel). (815).
VOAS	75	Ayre & Sons, Ltd., Water St., St. John's, Nfld. "Voice of Ayre & Sons."
wcco	50000	Northwestern Broadcasting, Inc., Nicollet Hotel, Minneapolis, Minn. (Also Hotel Lowry, St. Paul). "Service to the Northwest." (CBS).
WPCH	500	Eastern Broadcasters, Inc., 1697 Broadway, New York, N. Y. (On WMCA Bldg.)
XFC	350	Gobierno del Estado de Aguascalientes, Aguascalientes, Ags., Mexico.
XFI	1000	Secretaria de Industro Commercio y Trabajo, Mexico City, Mexico. (818).

## 820 kilocycles 365.6 meters

CMGC 30 Oscar S. Mechoso, Independencia No. 56, Matanzas, Cuba. WHAS 25000 Louisville Times Co., Inc., 300 W. Liberty St., Louisville, Ky. (CBS).

## 830 kilocycles 361.2 meters

CMGA	100	L. Valdes Figueroa, Marti No. 19, Colon, Cuba. (834).
KOA	12500	General Electric Co., Managed by N. B. C., 1370 Krameria St., Denver, Colo. (NBC).
WEEU	1000	Berks Broadcasting Co., 533 Penn St., Reading, Pa.
WHDH	1000	Matheson Radio Co., Inc., 296 Huntington Ave., Boston, Mass. "The Voice from Home."
WRUF	5000	State of Florida, University of Florida, Gainesville, Fla. "The Voice Florida." "State and University Radio Station." CBS).
XETW	500	Rafael M. Pena, Mexico City, Mexico.

## 840 kilocycles 356.9 meters

CHNC	5000	Canadian National Carbon Co., Ltd., Toronto, Ont.
CKGW	5000	Gooderham & Worts, Ltd., King Edward Hotel, Toronto, Ont. "Canada's
		Cheerio Station." (NBC).
CKLC	1000	Alberta Broadcasting Co., Renhew Bldg., Calgary, Alberta. (Station at Red
	_	Deer, Alta.)
CMC	500	Cuban Telephone Co., Aguila y Dragones, Havana, Cuba.
CPR Y	5000	Canadian Pacific Co., Royal York Hotel, Toronto, Ont.
XETH	100	Ramon Huerta, Puebla, Mexico.
XETM	150000	Miguel Muzquiz, Matamoros, Tams., Mexico. (845).

## 850 kilocycles 352.7 meters

KIEV KWKH	$\begin{array}{c}100\\10000\end{array}$	Cannon Systems, Inc., Glendale, Calif. Hello World Broadcasting Corp., Spring and Fannin Sts., Shreveport, La.
WWL	10000	"Voice of the People." Loyola University, Op. by WWL Development Co., Montileone Hotel, New
		Orleans, La.

XEFD 300 Carlos de la Sierra, Tiajuana, B. C., Mexico. (855).

# 860 kilocycles 348.6 meters

WABC	50000	Atlantic Broadcasting Corp., 485 Madison Ave., New York, N. Y. (Uses call WBOQ for tests). (CBS).
WHB	500	WHB Broadcasting Co., 12th floor Scarritt Bldg., 9th and Grand Sts., Kansas City, Mo.
XFX	500	Secretaria de Educacion Publica, Mexico City, Mexico.

# 870 kilocycles 344.6 meters

WENR	50000	Great Lakes Broadcasting Co., Managed by N. B. C., 222 No. Bank Drive,
		Chicago, Ill. "The Voice of Service." (NBC).
WLS	50000	Agricultural Broadcasting Co., 1230 W. Washington Blvd., Chicago, Ill.
		"The Prairie Farmer Station." (NBC).
XEAD	250	Julio Zetina Osorio, Mexico City, Mexico. (875).

## 880 kilocycles 340.7 meters

CHML	50	Maple Leaf Radio Co., Ltd., 36 James So., Hamilton, Ont. (On the Pegott Bldg.)
CJCB	100	Nathanson Radio Headquarters, 318 Charlotte St., Sydney, N. S.
CKCV	100	Vandry, Inc., 252 Avenue Marguerite-Bourgeois, Quebec, Que. "The Voice of French Canada."
KFKA	500	Midwestern Radio Corp., P. O. Box 735, Greeley, Colo. (On the McCreery Bldg.)
KLX	1000	The Tribune Publishing Co., 13th and Franklin Sts., Oakland, Calif. "Where Rail and Water Meet."
KPOF	500	Pillar Of Fire, 1845 Champa St., Denver, Colo. (Belleview College and Pillar of Fire Memorial Hall) "And the Lord Went Before Them in the Pillar of Fire to Give Them Light."
wcoc	500	Mississippi Broadcasting Co., Inc., First National Bank Bldg., Meridian, Miss. "Down in the Old Magnolia State."
WGBI	250	Scranton Broadcasters, Inc., 116 No. Washington Ave., Scranton, Pa.
WQAN	250	Scranton Times, 149 Penn Ave., Scranton, Pa. "Voice of Anthracite."

WSUI 500 State University of Iowa, Iowa City, Iowa.

## 890 kilocycles 336.9 meters

CFBO	500	C. A. Munro, Ltd., Canterbury St., St. John, N. B.
ČKĆŎ	100	Dr. G. M. Geldert, 272 Somerset St., West, Ottawa, Ont.
CKPR	100	Radio Station CKPR, Fort William, Ont. (Royal Edward Hotel). (Dougall Motor Car Co., Ltd., Owners).
CMCF	250	Raoul Karman, Casa Delaporte, Rayo No. 67, P. O. Box 647, Havana, Cuba.
CMX	750	Casa "Lavin," Francisco A. Lavin, Admr., Avenue de la Republica No. 99-A, Havana, Cuba.
KARK	250	Arkansas Radio & Equipment Co., 210 Center St., Little Rock, Ark. (On the National Standard Bldg.)
KFNF	500	Henry Field Co., 407 Sycamore St., Shenandoah, Iowa. "The Friendly Farmer Station."
KSEI	250	Radio Service Corp., 141 So. 6th Ave., Pocatello, Idaho.
KUSD	500	University of South Dakota, Vermilion, S. D. "Voice of South Dakota in the Sunshine State."
VOGY	100	Newfoundland Broadcasting Co., St. John's, Nfld.
WGST	250	Southern Broadcasting Co., Ansley Hotel, Atlanta, Ga. (CBS).
WILL	250	University of Illinois, 362 Administration St., W., Urbana, Ill. "The Roger C. Sullivan Memorial Station."
WJAR	500	The Outlet Co., Weybossett St., Providence, R. I. "The Southern Gatewa of New England." (Red).
WMMN	250	A. M. Rowe, Inc., 325 Adams St., Fairmont, W. Va. "The Friendly Station." (NNRC tips).
XETU	100	Rodrigo Manriquez, Pachuca, Hdo., Mexico.

# 900 kilocycles 333.1 meters

KGBU	500	Alaska Radio & Service Co., Inc., Mile Five, Wards Cove Road, Ketchikan,
		Alaska. "KGBU, the Voice of Alaska."
KHJ	1000	Don Lee Broadcasting System, 1076 West 7th St., Los Angeles, Calif. (CBS).
WBEN	1000	WBEN, Inc., Buffalo Evening News Station, Hotel Statler, Buffalo, N. Y. (Red).
WJAX	1000	City of Jacksonville, Water Works Park, Jacksonville, Fla. "WJAX, Jackson- ville, Fla., the Land of Sunshine." (NBC).
WKY	1000	Oklahoma Publishing Co., Plaza Court Bldg., Oklahoma City, Okla. "WKY, the Daily Oklahoman, the Oklahoma City Times, and the Oklahoma Farmer Stock Station." (NBC).
WLBL	2500	Wisconsin Department of Agriculture and Markets, 422 Main St., Stevens Point, Wis. "Wisconsin, Land of Beautiful Lakes." (On the Midwesco Theatre Bldg.)

#### 910 kilocycles 329.6 meters CFCH CFLC CFOC TICR 100 Northern Supplies, Ltd., Room 15, Capitol Theatre Bldg., North Bay, Ont. RADIO Association of Prescott, P. O. Box 16, Prescott, Ont. (915). 100 The Electric Shop, Ltd., Saskatoon, Sask. Government of Costa Rica, San Jose, Costa Rica. (911). Cadena Radiodifusoria Mexicana, S. A., 16 de Septembre, No. 9-A, Mexico City, Mexico... "The Voice of Latin America from Mexico." 500 50 XEW 5000 XFF 500 Gobierno del Estado de Chihuahua, Mexico. (915). 920 kilocycles 325.9 meters CMBW CMCN 150 Alvarez-Moris, Ayesteran No. 13, Havana, Cuba. (925). Antonio Ginard, Reina y Avenue Buen Retiro, Mariano, Havana, Cuba. 250 (925) 1000 HHK Republic of Haiti, Port-au-Prince, Haiti. "Mile High Broadcast Station." Bldg., Denver, Colo, "The Voice KFEL 500 500 Gene O'Fallon, Albany Hotel, Denver, Colo. "Mile High Broadce Colorado Radio Corp., 202 Continental Oil Bldg., Denver, Colo. KFXF of Denver. Fisher's Blend Station, Inc., Skinner Bldg., Seattle, Wash. (NBC). Houston Printing Co., Publishers, Houston Post, 2204 Houston Post Bldg., Houston, Texas. "Skyline Studios." (NBC) KOMO 1000 KPRC 1000

- 500 Drovers Journal Publishing Co., 836 Exchange Ave., Chicago, Ill. (On Ex-WAAF change Bldg.)
- Broadcasting Service Organization, Inc., Babson Park, Mass. The Detroit News, Second and Lafayette Blvd., Detroit, Mich. (Red). WBSO 500

WWJ 1000

#### 322.4 meters 930 kilocycles

CFRC	50	Queens University, Kingston, Ont.
CKPC	100	Cyrus Dolph, 286 Guelph St., Preston, Ont. (Galt and Preston Community Station). (NNRC tips).
CKX	500	Manitoba Telephone System, Brandon, Man.
CMJF	200	John L. Stowers, Hotel Plaza, Camaguey, Cuba.
KFŴI	500	Radio Entertainments, Inc., 505 Geary St., San Francisco, Calif. (In the Bellevue Hotel).
KGBZ	500	Dr. Geo. R. Miller, 715 Grant Ave., York, Neb.
KMA	500	Earl E. May Seed and Nursery Co., Shenandoah, Iowa. "Keeps Millions Advised."
KROW	500	Educational Broadcasting Corp., 1520 Eighth Ave., Oakland, Calif. (Uses remote control from Manx Hotel, San Francisco).
WBRC	500	Birmingham Broadcasting Co., Inc., 2300 Fifth Ave., Birmingham, Ala. "WBRC, At the Bankhead Hotel." (CBS).
WDBJ	250	Times-World Corp., 122 West Church Ave., Roanoke, Va. (On the Shenan- doah Life Insurance Co. Bldg.) (CBS).
WIBG	25	WIBG, Inc., Reswick Bldg., Glenside, Pa.

## 940 kilocycles 319.0 meters

KOIN	1000	KOIN, Inc., 5th and Main Sts., Portland, Ore. "The Journal." (New Heathman Hotel). (CBS).
WAAT	300	Bremer Broadcasting Corp., 50 Journal Square, Jersey City, N. J. "WAAT, the Voice of the Gate of the Garden State." (Hotel Plaza). (NNRCtips).
WSCH	1000	Congress Square Hotel Co., 579 Congress St., Portland, Maine. (On the Eastland Hotel). (Red).
WDAY	1000	WDAY, Inc., Black Bldg., Fargo, N. D. (NBC).
WFIW	1000	WFIW, Inc., Eight and Main Sts., Hopkinsville, Ky. "Veribest and Bluewngi Flour Station, Hopkinsville in Ole Kentucky." (CBS).
WHA	1000	University of Wisconsin, Madison, Wis. "America's First Educational Radio Station."
XEFO	5000	National Revolucionario Party, Avenue Morelos 110, Mexico City, Mexico. "Radio Nacional."

## 950 kilocycles 315.6 meters

CMHD	250	Manuel Alvarez, M. Escobar No. 17, Caibarien, Cuba.
KFWB	1000	Warner Brothers Broadcasting Corp., 6425 Hollywood Blvd., Los Angeles,
NOIN	1000	Calif.
KGHL	1000	Northwestern Auto Supply Co., 4th and Broadway, Billings, Mont. (NBC).
KMBC	1000	Midland Broadcasting Co., Pickwick Hotel, Kansas City, Mo. (CBS).
WRC	500	National Broadcasting Co., Inc., National Press Bldg., Washington, D. C.
		(NBC).

### 960 kilocycles 312.3 meters

CHCK

100 J. A. Gesner and W. E. Burke, Box 321, Charlottetown, P. E. I. "Voice of Canada's Garden Province."

	IN	IDEX E	BY FRE	QUENCIES	S A	ND DIAL	NUMBEI	RS
СНЖС СКСК	<b>500</b> <b>50</b> 0	Leader-	Post, Lee	Sons, Ltd., H der Bldg., 1	Hote Regi	l Kitchner, I na, Sask.	Regina, Sask. ''Saskatchev	van's Dominant
CKNC	500	Daily Canadia	an Nation	al Carbon Co	o., L	td., 805 Dav	enport Road	d, Toronto, Ont.
CMBD CMCW	150 150	Luis Per Vilarino	Cerbante	, Enamorados es y Lorenzo,	Fab			na, Cuba. (965). , Havana, Cuba.
XEAW	10000	Cia Inte	ernational	lding). (965). Difusora de R	Reyn	osa, S. A., Re	ynosa, Tams	., Mexico. (965).
CMJL YVIBC	50 5000	Enrique Broadca	e Artime, ( isting Car	Cuba No. 27, 0 acas, Apartad	Cam lo Co	aguey, Cuba orreos 290, C	aracas, Vene	zuela.
<b>970</b> 3	kilocy	cles	309.1	meters	ľ			
KJR WCFL	5000 1500	Chicago	Federatic	ation, Inc., Sl on of Labor, 6 ican Furnitur	566 L	ake Shore I	rive, Chicag	
<b>980</b> 0	kilocy	cles	303.9	meters	T			
CFCN	10000		ce of the F	Prairies, Ltd.,	Tore	onto General	Trusts Bldg	., Calgary, Alta.
CMGF KDKA	100 50000	(985). Bernabe Westing "Pion	e R. de la house Ele eer Broad	Torre, G. Bet ectric & Mfg. casting Statio	tanco ;. Co on of	ourt No. 105. ., William I f the World.	, Matanzas, Penn Hotel, ''' (Blue).	Cuba. (987). Pittsburgh, Pa.
<b>990</b> 1	kilocy	cles	302.8	meters	ľ			
WBZ	25000			ctric & Mfg. station in Sp				, Mass. (WBZA
XEK	100	Arturo	Martinez,	Mexico City,	Mex	ico.		
1000	kilocy	ycles	299.8	meters				
KFVD	250		eles Broad Cord Bidg	casting Co., 6	645 \$	S. Mariposa .	Ave., Los An	geles, Cal. (Au-
WHO WOC	5000 5000	Central	Broadcast	ing Co., 6th S	St. an Bra	nd Grand Av dy St., Dave	e., Des Moin nport, Iowa	es, Iowa. (Red). (Palmer School
WORK XEA	$\begin{array}{c} 1000 \\ 100 \end{array}$	York Br Radiofo	oadcastin nografica d	g Co., 13 S. B	leave ra S.	r St., York, A., Ap. 197.	Pa. 16 de Senten	abre 170 Guada-
XEC XEFE	50 100	lesus R	Benavide	s, Toluca, Me a, Nuevo Lare	rico			,
XEFI XEFJ	100	Felician	o Lopez Is	las, Chihuah la Vega, Mor	ua,	Chih., Mexic		
XEFS	100 40	Salvado	Sanchez,	Queretaro, Q	Dro.,	Mexico.	lexico.	
XEL	10	Antonic Coach	o Garza Ca , Mexico.	stro y J. T. Pe ''La Vox de	Salt	Apdo. Postal illo.'' (Escu	18, Escuela l ela Normal).	Normal, Saltillo,
1010	kilocy	cles	296.9	meters	Г			
CFCO	250			lliam Pitt Ho	otel,	Chatham, C	Ont. (NNRC	tips) "Coming

- CKIC CMBZ 50
  - 150
- KGGF 500
- KQW 500
- John Beardail, William Pitt Hotel, Chatham, Ont. (NNRC tips) "Coming From Chatham, Ontario."
  Acadia University, Wolfville, N. S.
  Manuel y G. Salas, San Rafael No. 14, Havana, Cuba.
  Hugh J. Powell and Stanley Platz, 8th and Elm Sts., Coffeyville, Kansas.
  Pacific Agricultural Foundation, Ltd., 87 E. San Antonio, St., San Jose, Calif. "For God and Country."
  Marcus Loew Booking Agency, 1540 Broadway, New York, N. Y. "There is Always a Good Show at any Loew Theatre." (Loew State Theatre Bldg.)
  WIS, Inc., 1811 Main St., Columbia, S. Car. "Wonderful Iodine State." (Jefferson Hotel). (NBC).
  University of Oklahoma, Norman, Okla.
  Marcus Loew Booking Agency. (See WHN above).
  Marcus Loew Booking Agency. (See WHN above).
  Juan G. Buttner and Leo Allande, P. O. Box 111, Juarez, Chih., Mexico. "The Voice of the Booker." (Lora American Gardens). (1015).
  Baltasar Pazos Sosa, Vicario 12, Veracruz, Ver., Mexico. "El Eco de Sotavento desde Veracruz." WHN 250 WIS 500
- WNAD 500
  - 250
- WPAP WQAO WRNY 250
  - 250
- XEJ 500
- XEU 100

#### 1020 kilocycles 293.9 meters

KYW 10000 Westinghouse Electric & Mfg. Co., 310 S. Michigan Ave., Chicago, Ill. (Straus Bldg.) (Also uses call KFKX). (NBC).

WRAX	250	WRAX Broadcasting Co., 217 S. Broad St., Philadelphia, Pa. "The Foreign Language Station."
XEFC	10	Hugo Molina Font, Merida, Yuc., Mexico.
1030	kilocy	cles 291.1 meters
CFCF	500	Canadian Marconi Co., 1231 St. Catherines St., W., Montreal, Que. (Mount Royal Hotel). (NBC).
CMHI	30	Laviz and Paz, Independencia No. 34, Santa Clara, Cuba. "La Voz de la Victor." (Alverez de la Campa).
CMKC	150	Pinol Batlle y Co., J. A. Saco, Alta 23, Santiago de Cuba. (1034).
CNRV	500	Canadian National Railways, 1150 Main St., Vancouver, B. C.
XEB	10000	Cia Manfra de Cigaros El Buen Tono S. A., Calle de Buentono 6, Mexico City, Mexico.
1040	kilocy	vcles 288.3 meters
CMGH	15	Octavio y Julio Alvarez, B. Byrne No. 113, Matanzas, Cuba.

KRLD	10000	KRLD Radio Corp., 1516 Kirby Bldg., Dallas, Texas. (Adolphus Hotel).
ктнѕ	10000	(CBS). Hot Springs Chamber of Commerce, 135 Benton St., Hot Springs, Ark, "Kum
ICTI10	10000	To Hot Springs." (NBC).
WESG	1000	WESG, Inc., Mark Twain Hotel, Elmira, N. Y. (Transmitter owned by
		Cornell University and located at Ithaca, N. Y.)
WKAR	1000	Michigan State College, East Lansing, Mich.

## 1050 kilocycles 285.5 meters

CMJG	50	Jose Antonio Lefran, Martires No. 133, Camaguey, Cuba.
KFBI	5000	Farmers & Bankers Life Ins. Co., Box 345, Abilene, Kansas.
KNX	25000	Western Broadcast Co., 5555 Marathon St., Hollywood, Calif. Voice of Holly-
		wood." (Paramount Pictures).
XES	250	Defusora Portena, Aduana 4 Sur Altos, Box 309, Tampico, Tams., Mexico.
		"The Voice of the Gulf of Mexico from Tampico." (1055).

## 1060 kilocycles 282.8 meters

KWJJ WBAL	500	KWJJ Broadcast Co., Inc., 220 Broadway, Portland, Ore.
WBĂĹ	10000	Consolidated Gas, Electric Light & Power Co., Lexington Bldg., Baltimore,
		Md. "This is Baltimore." (Blue).
WJAG	1000	Norfolk Daily News, Norfolk, Nebr. (Hotel Norfolk). (Henry Field Trading
		Co.)
WTIC	50000	Travelers Broadcasting Service Cop., 26 Grove St., Hartford, Conn. (Red).

## 1070 kilocycles 280.2 meters

CMBG	225	John L. Stowers, Hospital No. 100, Havana, Cuba.	
CMCB	150	Metropolitan-Radio de Cuba, Metropolitan Bldg., Havana, Cuba.	
KJBS	100	Julius Brunton & Sons Co., 1380 Bush St., San Francisco, Calif.	
WCAZ	50	Superior Broadcasting Service, Inc., 971/2 Adams St., Carthage, Ill.	
WDZ	100	James L. Bush, Star Store Bldg., Tuscola, Ill.	
WTAM	50000	National Broadcasting Co., Inc., 1367 East 6th St., Cleveland, Ohio.	(Red).
XEG	500	Ricardo Gonzalez Montero, Mexico City, Mexico. (1075).	• •

## 1080 kilocycles 277.6 meters

WBT	25000	Station WBT, Inc., Wilder Bldg., Charlotte, N. C. "Pioneer Broadcasting Station of the South." (CBS).
WCBD	5000	Wilbur Glenn Voliva, Temple Site, Zion, Ill. "Where God Rules Man Prospers."
WMBI	5000	Moody Bible Institute of Chicago, 153 Institute Place, Chicago, Ill. "West- point of Christian Service."

## 1090 kilocycles 275.1 meters

KMOX	50000	Voice of St. Louis, Inc., Mart Bldg., St. Louis, Mo.	(CBS).
XEAI	100	Carlos Gonzales Caballero, Mexico City, Mexico.	```

## 1100 kilocycles 272.6 meters

- E. F. Peffer, 42 S. California St., Stockton, Calif. "KGDM, the Peffer Broad-casting Station." KGDM 250 WLWL 5000
- Missionary Society of St. Paul the Apostle, Op. by Universal Broadcasting Corp., 425 W. 59th St., New York, N. Y. Municipality of Atlantic City, Op. by Columbia Broadcasting System, Con-vention Hall, Atlantic City, N. J. "World's Playground." (CBS). WPG 5000

## 1110 kilocycles 270.1 meters

 CMJO
 50
 J. M. Rey Sarmiento, Gral. Machado y Amaceo, Ciego de Avila, Cuba.

 KSOO
 1000
 Sioux Falls Broadcast Assn., Inc., Carpenter Hotel, Sioux Falls, S. D.

 WRVA
 5000
 Larus & Bros. Co., Inc., 21nd and Cary Sts., Richmond, Va. "Down Where the South Begins." (NBC).

 XENT
 150000
 Compani Industrial Universal S.A., Apdo. 47, Nuevo Laredo, Tams., Mexico. (Mail: Box 163, Laredo, Tex.) "Voice of the Continents." (1115).

## 1120 kilocycles 267.7 meters

CFCA	500	Toronto Daily Star, 80 King St., W., Toronto, Ont.
CFJC	100	Review Publishing Co., Ltd., Box 760, Kamloops, B. C. "CFJC, the Sentinal,
		Kamloops.'
CHGS	100	R. T. Holman, Ltd., Water St., Summerside, P. E. I.
CHLP	100	LaPatrie Publishing Co., Ltd., Montreal, Que,
CJOC	100	H. R. Carson, Ltd., Marquis Hotel, Fourth Ave., Lethbridge, Alta. "The
		Sunny South Station."
CMHJ	40	Victorino Lopez, Apdo. 57, Cienfuegos, Cuba. (Hotel Bristol). (1125).
KFIO	100	Spokane Broadcasting Corp., 213 Riverside, Spokane, Wash. "The Friendly
		Station." (Pedicord Hotel).
KFSG	500	Echo Park Evangelistic Assn., 1100 Glendale Blvd., Los Angeles, Calif.
		"KFSG, the Glory Station of the Pacific Coast."
KRKD	500	Fireside Broadcasting Co., 815 Spring Arcade Bldg., Los Angeles, Calif.
KRSC	100	Radio Sales Corp., Washington Athletic Club, Seattle, Wash.
KTRH	500	KTRH Broadcasting Co., Main and Texas Sts., Houston, Texas. "The Rice
		Hotel, Houston's Welsome to the World." (CBS).
WDEL	250	WDEL, Inc., 10th and King Sts., Wilmington, Del.
WHAD	250	Marquette University, 1511 W. Wisconsin Ave., Milwaukee, Wis. (CBS).
WISN	250	American Radio News Corp., 123 W. Michigan Ave., Milwaukee, Wis. "The
		News at Milwaukee." (Évening Wisconsin). (CBS).
WTAW	500	Agricultural and Mechanical College of Texas, College Station, Texas.

## 1130 kilocycles 265.3 meters

KSL	50000	Radio Service Corp. of Utah, 504 Vermont Bldg., Salt Lake City, Utah. "Voice
		of the Intermountain Empire." (CBS).
WJJD	20000	WJJD, Inc., Palmer House, Chicago, Ill. (Loyal Order of Moose). (Remote
		control from Aurora, Ill.)
WOV	1000	International Broadcasting Corp., 16 E. 42nd St., New York, N. Y. "Public
		Service Station."
XEH	250	Tarnava y Cia., P. Mier 215, Monterrey, N. L., Mexico, "Voz de Monterrey,"
		(1132).

## 1140 kilocycles 263.0 meters

CMBJ	150	Emilio Perera, Consulado y Virtudes, Havana, Cuba.
CMCD	250	Angel Bertematy y Garcia, Hotel Palace, G. y 25, Vedado, Havana, Cuba.
		"Radio Popular Cubana."
KVOO	<b>50</b> 00	Southwestern Sales Corp., Wright Bldg., Tulsa, Okla. "Voice of Oklahoma."
		(NBC).
WAPI	<b>50</b> 00	WAPI Broadcasting Corp., 2021 First Ave., Birmingham, Ala. "Voice of
		Alabama." (Protective Life Bldg.) (NBC).
ХЕТА	250	Manuel Espanosa Tagle, Mexico City, Mexico.

## 1150 kilocycles 260.7 meters

CMJH	30	Luis Marauri Mendoza, Independence St. No. 89, Ciego de Avila, Cuba.
-		"La Voz de la Victor." "La Moderna Poesia y Cervantes."
WHAM	25000	Stromberg-Carlson Tel. Mfg. Co., 100 Carlson Road, Rochester, N. Y. "There
		is Nothing Finer Than the Stronberg-Carlson." (Sagamore Hotel). (Blue).
XED	500	International Broadcasting Co., Guadalajara, Jal., Mexico. (1155).
10-AT	25	Trail Amateur Radio Assn., Trail, B. C. (1155).

# 1160 kilocycles 258.5 meters

WOWO 10000 Main Auto Supply Co., 215 W. Main St., Fort Wayne, Ind. (CBS).
 WWVA 5000 West Virginia Broadcasting Corp., Hawley Bldg., Wheeling, W. Va. (CBS).

## 1170 kilocycles 256.3 meters

CMJE

50 Manuel Fernandez, Plaza de Maceo, Camaguey, Cuba. (1175). (Casa Monteavaro).

WCAU 50000 WCAU Broadcasting Co., 1321 Arch St., Philadelphia, Pa. (CBS).

4400	4 .4	•				
1180	kilocy			l meters		
CMBN	150	G. de Sec	ueira. /	Agrimonte No.	32, Regla, Havana, Cu , Havana, Cuba. (1185 Terminal Sales Bldg., ' (NBC).	ba. (1185).
CMCJ	250	Rafael Ro	driguez	. Estevez No. 4	Havana, Cuba, (1185	).
KEX	5000	National	Broadca	sting Co., 203	Terminal Sales Bldg.,	Portland, Ore. "The
		Friendl	iest Spo	t on the Dial.'	(NBC).	,
KOB	20000	New Mex	ico Colle	ege of Agricult	ure & Mechanic Arts, A	Albuquerque, N. Mex.
WDGY	1000	Dr. Geor	ge W. J	oung, 909 We	ure & Mechanic Arts, A nwest.'' (Operated by A st Broadway, Minnear You.''	olis, Minn. "Follow
WINS	500	American	Radio	News Corp.,	114 E. 58th St., New ew York Evening Journ 211 Cotton Ave., Macou	York, N. Y. "Voice
WMAZ	500	Southeas	IOFK AL	nerican and N	211 Cotton Ave. Macon	al. (Ritz lower).
W WIAD	500	the Hea	art of G	corgia."		in, Ga. Macon, in
1190	kilocy	cles	252.0	) meters		
	50000				mo and North St. Mar	nie Ste San Antonio
WOAI	30000	Tavae	"The V	Vinter Playaro	ind of America "(NBC)	ys sis., san Antonio,
WSAZ	250	WSAZ. I	nc. 929	6 Fourth Aver	rro and North St. Mar and of America."(NBC) aue, Huntington, W. Va d., P. O. Box 1355, St.	• 8.
VONF	100	Dominio	1 Broad	casting Co., Lt	d., P. O. Box 1355. St.	John's, Nfld. (1195).
1200	1-11-07	100	240 0	) manatama	1	
1200	KHOCY	cies	249.3	) meters	the second second	
CHCH	100	Montreal	Radio (	Corp., 4 Notre	Dame St., W., Montrea	al. Que.
CKOV	100	Okanagai	1 Broad	asters. Ltd., J	W. B. Browne, P. O. B	ox 243. Kelowna, B. C.
		"The V	oice of t	he Okanagan,	' (NNRC tips)	,
CMGB	30	Jose Anor	rga, Ma	gdelena No. 1,	Matanzas, Cuba. (120	5).
KBTM	100	W. J. Be	ard, Bea	ird's Temple o	f Music, 219 S. Pruett	St., Paragould, Ark.
		''The V	oice of (	Crowley's Ridg	Dame St., W., Montree W. B. Browne, P. O. B. ' (NNRC tips) Matanzas, Cuba. (120 f Music, 219 S. Pruett 2.''	
KERN	100	The Dee	Dakeisn	elu broadcasti	ng Co., Elks Club, 17tl	n and I. Sts., Bak <b>ers-</b>
	100	field, C	alif. (C	BS).		
KFJB	100			: Co., Inc., 160	3 W. Main St., Marshal	lltown, Iowa. ''Heart
KFWF	100	of Iowa		Center Inc. B	Rev. E. C. Hartmann, 4	1030 Lindell Blvd St
IG WI	100	Louis, N		center, men, i	ceri E. C. Hartmann,	into Eniden Erici, St.
KFXD	100	Frank E.	Hurt,	Box 871, Nami	oa, Idaho. "''Idaho's S	tation KFXD." (Re-
		mote o	ontrol fi	rom studios in	Saratoga Hotel, Caldw	ell Hotel and Owyhee
		Hotel,	Boise, Io	laho).		
KFXJ	100	Western	Slope B	roadcasting C	o., Hillcrest Manor, G	rand Junction, Colo.
KODE	100	C I Jam	of the w	estern Slope."	The Minn Street	Laka Parian Station "
KGDE KGEK	100	Reebler H	lectrica	1 Fouinment	a 109 W Second St.	Yuma Colo "The
	100	Big Lit	tle Stati	on on the Plair	us Falls, Minn. "The Co., 109 W. Second St. is of Northeastern Color	ado."
KGEW	100	City of F	ort Mo	gan, City Hal	l, Fort Morgan, Colo.	"Voice of Municipal
KGFJ	100	Ben S. N	<b>icGlash</b>	an, 1417 S. Fig	ueroa St., Los Angeles	3, Calif. "KGFJ, the
ROLL	100	Twenty	-four H	our Station.	(on the J. V. Baldwin B	ildg.).
KGHI	100	Lloyd Ju	da Co., the Mer	Marion Hotel	ueroa St., Los Angeles (on the J. V. Baldwin E , Little Rock, Ark. ''l the Commercial Statio a, Mont. ''The Gardes and Empire Hotel M	"
KGVO	100	Moshu's	Inc Bo	v 1405 Miccour	a Mont "The Carde	n City Station "
KMLB	100	Liner's B	roadcas	ting Station	nc., Francis Hotel, M	onroe La. "Voice of
Rindb	100	Monroe		this otherion, i	inc., i funcis fiotor, in	
KVOS	100	KVOS, In	ic., Hen	ry Hotel, Bellir	gham, Wash.	
KWG	100	McClatch	ney News	spapers, Medic	gham, Wash. o Dental Bldg., Stockto	n, Calif. "The Home
		of Calif	ornia's '	Valley Port."	(CBS).	
WABI	100	First Un	iversalis	t Society of B	(CBS). angor, Park St., Bang	or, Maine. (Dorothy
WDDY	100	Memor	ial Buik	ling Studio).		
WBBX	100	44U/A D7	that	admill Station	siana, Inc., Marberc He	
WBBZ	100	C L Car	rel1 407	W South Ave	, Ponca City, Okla. " ntrol studios at Winfie Tonkawa and Cushing est Clinton St., Hunts I Erskine Hotel).	Biggest Little Station
	100	in the	Nation.	" (Remote co	ntrol studios at Winfie	ld. Arkansas City and
		Welling	ton. Ka	ns., Blackwell,	Tonkawa and Cushing.	Okla.).
WBHS	100	Radio St	ation W	BHS, Inc., W	est Clinton St., Hunts	wille, Ala. "Voice of
		Northe	rn Alabi	ama." (Russe	l Erskine Hotel).	
WCAT	100					
WCAX	100	Burlingto	n Daily	News, Inc., 20	College St., Burlingto	n, Vt.
WCLO	100	WCLO R	adio Cor	p., 200-204 E. N	3 College St., Burlingto filwaukee St., Janesvill Strong Bldg.).	e, wis. (Remote con-
WCOD	100	Keystone	Broad	esting Corn	Ath and Market Sts	Harrisburg Pa (On
	100	the Go	vernor H	lotel). "Wond	lerful City of Distributi	ion."
WFAM	100	South Be	nd Trib	une, 200 W. C	Ath and Market Sts., lerful City of Distribution offax St., South Bend,	Ind. (Studios in Tri-
		bune B	ldg.). (	Old Call WSB1	). (CBS).	
WFBC	100	News-Pie	dmont	Co., Greenville	S. Car.	
WFBE	100	Radio St	ation V	FBE, Inc., H	olfax St., South Bend, . ). (CBS). , S. Car. otel Sinton-St. Nichol Post.'' vas St. Canton Ohio	as, Cincinnati, Ohio.
WHBC	10	Edward E	Orce of t	m 319 Tuscom	was St., Canton, Ohio.	
	10	Luwaru r	· Orana	in, or a ruscara	was ou, canton, Onio.	

WHBY 100 WHBY, Inc., Green Bay, Wis. (Atop the Bellin Bldg.).

WIBX	100	WIBX, Inc., 187 Genesee St., Utica, N. Y.
WIL	100	Missouri Broadcasting Corp., Melbourne Hotel, Grand and Lindell Sts., St.
		Louis, Mo. "Choice of the Multitude."
WJBC	100	Kaskaskia Broadcasting Co., Kaskaskia Hotel, LaSalle, Ill. "The Voice of
		the Illinois Valley."
WJBL	100	Commodore Broadcasting, Inc., 134 S. Water St., Decatur, Ill.
WJBW	100	C. C. Carlson, 2743 Dumaine St., New Orleans, La. "Louisiana's Friendly
		Broadcasting Station."
WKJC	100	Lancaster Broadcasting Service, Inc., 16 W. King St., Lancaster, Pa. "Your
		Own Radio Station." (Studios in Kirk-Johnson Bldg.).
WLAP	100	American Broadcasting Corp. of Kentucky, 212 Speed Bldg., Louisville, Ky.
WNBO	100	Sprigg Symplex, Warner-State Studio, Washington, Pa. "Voice of South-
		western Pennsylvania." (Studio at Silverhaven, Pa.).
WNBW	10	WNBW, Inc., 50 Main St. N., Carbondale, Pa.
WORC	100	A. F. Kliendienst, 60 Franklin St., Worcester, Mass. (CBS).
WPHR	100	WLBG, Inc., Medical Arts Bldg., Petersburg, Va. "Serving Virginia's In-
		dustrial Triangle."
WRBL	100	WRBL Radio Station, Inc., Columbus, Ga. "The Voice of the Chatta-
		hoochee." (Royal Theatre Bldg.).
WWAE	100	Hammond-Calumet Broadcasting Corp., 1525 E. 53rd St., Chicago. Ill. (Sta-
		tion at Hammond, Ind.). "Voice of the Calumet Region."
10-AB	25	Moose Jaw Radio Assn., Grant Hall Hotel, Moose Jaw, Sask. (NNRC tips).
10-AK	15	M. I. Higgins Electric & Radio Co., 151 Ontario St., Stratford, Ont. "Classic
		City Station."
10-BI	25	Prince Albert Radio Club, Orpheum Theatre Bldg., Prince Albert, Sask.
10-BP	25	W. T. Cruickshank, Box 65, Wingham, Ont. "Your Home Station." (Radio
		and Electric Shop). (1199).
10-BQ	15	Tom Brown and Harold Brown, 12 Terrace St., Brantford, Ont. "B for Brant- ford. O for Quality"

10-BU	15	Kenora	Radio	Assn.,	Railway	Ave.	Е.,	Kenora,	Sask.
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# 1210 kilocycles 247.8 meters

CFNB	100	James S. Neill & Sons, Ltd., Queen St., Fredericton, N. B.
CJOR	500	George C. Chandler, 804 Hornby St., Vancouver, B. C. (Alexandra Ballroom).
CKMC	100	R. L. MacAdam, Box 788, Cobalt, Ont.
KASA	100	E. M. Woody, 3rd and Main Sts., Elk City, Okla. "The Voice of Western
RASA	100	
WDI D		Oklahoma.'' (Casa Grande Hotel).
KDLR	100	KDLR, Inc., 1025 Third St., Devils Lake, N. D.
KFJI	100	KFJI Broadcasters, Inc., 205 Main St., Klamath Falls, Ore. (Willard Hotel).
KFOR	100	Howard Shuman, Box 1537, Lincoln, Nebr. (Securities Mutual Life Bldg.)
		(NNRC tips).
KFPW	100	Southwestern Hotel Co., 1213 Garrison Ave., Fort Smith, Ark. "Voice
		Fort Smith.'' (Goldman Hotel).
KFVS	100	Oscar C. Hirsch, Box 275, Cape Girardeau, Mo. (Marquette Hotel).
KFXM	100	Lee Bros. Broadcasting Co., California Hotel, San Bernardino, Calif. "Voice
<b>KI</b> 'AM	100	of the Sunkist Valley." (NNRC tips).
VCOD	100	of the Sunkist valley. (NNRC tips).
KGCR	100	Greater Kampeska Radio Corp., 312 Citizens Bank Bldg., Watertown, S. D.
		"Voice of Friendship." (MeDette Hill.)
KGNO	100	Dodge City Broadcasting Co., First National Bank Bldg., Dodge City, Kans.
		"The Voice of the Great Southwest."
KGY	100	KGY, Inc., Capitol Park Bldg., Olympia, Wash.
KIEM	100	Harold H. Hanseth, Eureka, Calif.
KPPC	50	Pasadena Presbyterian Church, 585 E. Colorado St., Pasadena, Calif.
KWEA	100	Hello World Broadcasting Corp., Spring and Fannin Sts., Shreveport, La.
WALR	100	WALR Broadcasting Corp., First Trust & Savings Bank Bldg., Zanesville,
WALK	100	Ohio. "Voice of Southeastern Ohio."
11/17 4 32	100	Unio. Voice of Southeastern Unio.
WBAX	100	John H. Stenger, Jr., 70 S. Main St., Wilkes Barre, Pa. "Home of Anthracite,
		World's Most Economical Fuel." (Morris Bldg.).
WBBL	100	Grace Covenant Presbyterian Church, 1627 Monument Ave., Richmond, Va.
WCBS	100	WCBS, Inc., 2081/2 S. Fifth St., Springfield, Ill. "Home and Last Resting
		Place of Abraham Lincoln." (Frank A. Bridge Bldg.).
WCRW	100	Clinton R. White, 2756 Pine Grove Ave., Chicago, Ill.
WEBQ	100	Harrisburg Broadcasting Co., 100 E. Poplar St., Harrisburg, Ill.
WEDC	100	Emil Denemark Inc., 3860 Ogden Ave., Chicago, Ill.
WFAS	100	Westchester Broadcasting Corp., Roger Smith Hotel, White Plains, N. Y.
WIND	100	(NNRC tips).
WGBB	100	
	100	Harry H. Carman, 64 S. Grove St., Freeport, N. Y.
WGCM	100	Great Southern Land Co., Great Southern Hotel, Gulfport, Miss. "That
		Big Little Station."
WGNY	50	Peter Goelet, Chester, Orange Co., N. Y.
WHBF	100	Rock Island Broadcasting Co., Hotel Harms, Rock Island, Ill. "The Voice of
		the Ouad-Cities.'' (Rock Island Argus).
WHBU	100	Anderson Broadcasting Corp., 641 Citizens Bank Bldg., Anderson, Ind.
		"Your Station." (NNRC tips).
WHET	100	Troy Broadcasting Co., North Oak and E. Walnut Sts., Troy, Ala. (City Hall).
	100	(NNRC tips).
WIBU	100	Wm. C. Forrest, RFD No. 3, Poinette, Wis.
		With C. FOITESL, RED NO. 3, FOITELLE, WIS.
W JBI	100	Monmouth Broadcasting Co., Inc., 65 Broad St., Red Bank, N. J. "Voice
		of Red Bank in New Jersey".

WJBU	100	Bucknell University, Lewisburg, Pa. "In the Heart of the Keystone State."
WĴBY	100	Ingram's Broadcasting Co., 112 No. 8th St., Gadsden, Ala. "Down South Where Jay Birds Yodel."
WJEJ	100	A. V. Tidmore, Hotel Alexander, Hagerstown, Md. "The Voice of the Val- levs."
WJW	100	WJW, Inc., 41 So. High St., Akron, Ohio.
WKFI	100	J. Pat Scully, PO Box 302, Greenville, Miss. "The Voice of the Delta."
WMBG	100	Havens & Martin, Inc., 914 W. Broad St., Richmond, Va. (CBS).
WOCL	50	A. E. Newton, 840 N. Main St., Jamestown, N. Y. "We're on Chatauqua Lake."
WOMT	100	Francis Mangin, Kadow, PO Box 326, Manitowoc, Wis. "World's Only Mi- kadow Theatre."
WPAW	100	Cherry & Webb Broadcasting Co., 20 Richmond St., Providence, R. I. (Lowe's State Theatre Bldg.) (WPRO).
WODX	100	Stevens Luke, 1141 Gordon Ave., Thomasville, Ga.
WSBC	100	WSBC, Inc., 1250 S. Michigan Ave., Chicago, Ill.
WSEN	100	Columbus Broadcasting Corp., Seneca Hotel, Columbus, Ohio.
WSIX	100	Draughon Bros., 638 Tire & Vulcanizing Co., Springfield, Tenn. (Relays WLW). (NNRC tips).
WSOC	100	WSOC, Inc., 251 E. Main St., Gastonia, N. C.
WTAX	100	WTAX, Inc., 416 E. Capitol Ave., Springfield, Ill. (Hotel Abraham Lincoln).
37 12 37	500	

XEX 500 "Excelsior" Cia Editorial S. A., Mexico City, Mexico.

## 1220 kilocycles 245.8 meters

CMHK	15	Virgilio Villanueva, Heredia No. 61, Cruces, Cuba. (1225).
KFKU	500	University of Kansas, 109 Fraser Hall, Lawrence, Kans. "Broadcasting Sta-
		tion of the University of Kansas."
KTW	1000	First Presbyterian Church, 7th Ave. and Spring St., Seattle, Wash.
KWSC	1000	State College of Washington, Pullman, Wash.
WCAD	500	St. Lawrence University, Park St., Canton, N. Y. "Voice of the North Coun-
		try."
WCAE	1000	WCAE, Inc., & Pittsburgh Sun-Telegraph, 6th Ave. and Smithfield St.,
		Pittsburgh, Pa. (Red).
WDAE	1000	Tampa Daily Times, Tampa Terrace Hotel, Tampa, Fla. (CBS).
WREN	1000	Jenny Wren Co., 546 Massachusetts St., Lawrence, Kans. "The Jenny Wren
		Station." (Blue).

## 1230 kilocycles 243.8 meters

CMBY	250	Callejas-Estefani,	Principe No.	33,	Havana,	Cuba.	

- CMCA KFOD 150 250
- Manuel Cruz, Avenue de Italia, No. 102, Havana, Cuba. Anchorage Radio Club, Inc., Anchorage, Alaska. "The Voice of the Golden North. KGGM 250
- KYA WFBM 1000
- North." New Mexico Broadcasting Co., Franciscan Hotel, Albuquerque, N. Mex. "Voice of the Health Country." Pacific Broadcasting Co., 988 Market St., San Francisco, Calif. (NBC). Indianapolis Power & Light Co., 229 N. Pennsylvania St., Indianapolis, Ind. "The Cross Roads of America." (CBS). Shepard Broadcasting Service, Inc., I Winter Place, Boston, Mass. (Hotel Buckminster). (CBS). South Bend Tribune, South Bend, Ind. (Studios in the Tribune Bldg.) (WFAM). (CBS). 1000 WNAC 1000
- WSBT 500

## 1240 kilocycles 241.8 meters

CMAB	20	Jose Silvera, Marti No. 101, Pinar del Rio, Cuba. (1249).
CMJN	50	Ernesto de Ugarriza, Martires No. 11, Camaguey, Cuba.
KGČU	250	Mandan Radio Assn., 404 W. Main St., Mandan, N. Dak. "Voice of the
		West." (Hotel Lewis & Clark).
KLPM	250	John B. Cooley, Box 707, Minot, N. Dak, (Leland-Parker Hotel).
KTAT	1000	KTAT Broadcast Corp., Fort Worth National Bank Bldg., Fort Worth, Texas.
KTFI	500	Radio Broadcasting Corp. of Idaho, Box 521, Twin Falls, Idaho. "Radio
		Broadcasting Station of Southern Idaho." (Park Hotel). (NNRC tips).
WACO	1000	Central Texas Broadcasting Co., 412 Amicable Life Bldg., Waco, Texas. (CBS).
WKAO	1000	Radio Corp. of Porto Rico, Box 868, San Juan, Porto Rico. "Puerto Rico, the
•		Isle of Enchantment."
WXYZ	1000	Kunsky-Trendle Broadcasting Corp., 300 Madison Theatre Bldg., Detroit,
		Mich. "This is Your Station, WXYZ." (Maccabees Bldg.).
XEFW	70	Jose Expedito Martinez, Tampico, Tams., Mexico.
1050 1	•1	1 220.0

### 1250 kilocycles 239.9 meters

KFMX	1000	Carleton College, Northfield, Minn. "The Maize and the Blue Station."	
KFOX	1000	Nichols & Warinner, Inc., 220 E. Anaheim St., Long Beach, Calif. (Build	ling
		of Goodyear Service, Inc.). (CBS).	
WAAM	1000	WAAM, Inc., 1060 Broad St., Newark, N. J.	

- WCAL 1000
- St. Olaf College, Manitou Heights, Northfield, Minn. Joseph H. Uhalt, Hotel DeSoto, New Orleans, La. ''The Leader.'' (CBS). 1000

WGCP	250	May Radio Broadcasting Co., 609 Broad St., Newark, N. J. (Hahne Studios).
WLB	1000	University of Minnesota, St. Paul, Minn. "Voice of the Minnesota Campus."
WODA	1000	Richard E. O'Dea, 115 Ellison St., Paterson, N. J.
WRHM	1000	Minnesota Broadcasting Corp., Wesley Temple Bldg., Minneapolis, Minn.
		"Voice of the Gopher State." (Also Farmers Union, Minnesota Bldg., St
		Paul).

XEFA 500 Eduardo Limon Segui, Mexico City, Mexico.

## 1260 kilocycles 238.0 meters

KOIL	1000	Mona Motor Oil Co., Brandeis Studios, Omaha, Neb.	"Voice of Barnsdall."
		(Studio in Council Bluffs, Iowa). (Blue).	
TIDON	=		(D) () () () () () () () () () () () () ()

KRGV, Inc., Life Bldg). KRGV 500 Inc., Harlingen, Texas. "The Valley Voice." (Rio Grande National KVOA 500

- WLBW 500
- WNBX 250
- Sunshine City.
  Frank P. Jackson, Brownsville, Texas. (Brownsville Herald).
  Broadcasters of Pennsylvania, Inc., Erie, Pa. "Northwestern Pennsylvania's Broadcasting Station." (CBS).
  WNBX Broadcasting Corp., 31 Main St., Springfield, Vt.
  Savannah Broadcasting Co., Inc., DeSoto Hotel, Savannah, Ga. "City of Southern Charm." (CBS). WTOC 500

#### 1270 kilocycles 236.1 meters

- CMBC 150 Domingo Fernandez, Maximo Gomez No. 139, Havana, Cuba. "Progresso Cubano.
- KGCA 100 Charles W. Greenley, 201-203 Water St., Decorah, Iowa. "Decorah, Iowa, the KOL
  - 1000
- KVOR 1000KWLC 100
- Charles W. Greenley, 201-203 Water St., Decorah, Iowa. "Decorah, Iowa, the Switzerland of America." Scattle Broadcasting Co., Northern Life Tower, Seattle, Wash. (CBS). Reynolds Radio Co., Inc., Mining Exchange Bldg., Colorado Springs, Colo. "The Voice of the Rockies." (CBS). Luther College, Decorah, Iowa. Kunsky-Trendle Broadcasting Corp., 501 Young Bldg., Grand Rapids, Mich. The Baltimore, the Heart of Maryland." (Red). Lamar Life Insurance Co., Lamar Life Bldg., Jackson, Miss. "The Voice of Mississippi." (NBC). WASH 500 WFBR 500
- WJDX 1000 WOOD 500

#### 1280 kilocycles 234.2 meters

KFBB	1000	Buttrey Broadcast, Inc., Great Falls, Mont. "Voice of the Treasure State."
WCAM	500	City of Camden, 18th floor City Hall, Camden, N. J.
WCAP	500	Radio Industries Broadcast Co., Convention Hall, Asbury Park, N. J. "The

- Voice of the City of Asbury Park in New Jersey, One of America's Foremost All-Year Resort Cities." (CBS). WDOD Broadcasting Corp., Hotel Patten, Chattanooga, Tenn. (CBS). Badger Broadcasting Co., Inc., 111 King St., Madison, Wis. "WIBA, at Madison, the Four-Lake City." (NBC). City of Dallas, Hilton Hotel, Dallas, Texas. "World's Oldest Municipa 1000
- WDOD WIBA 500
- WRR 500 City of Dallas, Hilt Station." (CBS).
- WTNJ 500 Trenton Broadcasting Co., Stacy-Trent Hotel, Trenton, N. J.

## 1290 kilocycles 232.4 meters

CMHL	20	Uscar Zayas, San Carlos No. 143, Cientuegos, Cuba.
KDYL	1000	Intermountain Broadcasting Corp., Ezra Thompson Bldg., Salt Lake City,
		Utah. (NBC).
KFUL	500	News Publishing Co., Buccaneer Hotel, Galveston, Texas.
KLCN	100	C. L. Lintzenich, Main and Division Sts., Blytheville, Ark.
KTSA	1000	Southwest Broadcast Co., Plaza Hotel, San Antonio, Texas. (CBS).
WEBC	1000	Head of the Lakes Broadcasting Co., 1225 Tower Ave., Superior, Wis.
		"America's Greatest Inland Port." (Studios in the Spaulding Hotel in
		Duluth and the Telegram Building in Superior). (NBC).
WJAS	1000	Pittsburgh Radio Supply House, 427 Fourth Ave., Pittsburgh, Pa. (CBS).
WNBZ	50	Smith & Mace, 70 Broadway, Saranac Lake, N.Y.
XEAC	100	Francisco de P. Cabrera, San Luis Petosi, S. L. P., Mexico. (1295).
XFB	500	Gobierno del Estado de Veracruz, Jalapa, Ver., Mexico.
1200	1.1100	cles 230.6 meters
1.500	KHOCY	CIES LOU.D IHELEIS

CMKJ	20	Luis Morlote, East Giro No. 11, Guantanamo, Cuba.
KALĚ	500	KALE, Inc., 223 Weatherly Bldg., Portland, Ore. (CBS).
KFAC	1000	Los Angeles Broadcasting Co., Inc., 645 So. Mariposa Ave., Los Angeles, Calif.
		(Auburn-Cord Bld.)
KFH	1000	Wichita Eagle—Hotel Lassen, 124½ So. Market St., Wichita, Kans. (Wheeler-
		Kelly-Hagny Annex). (CBS).
KFJR	500	Ashley C. Dixon-KFJR, Inc., 95 Fifth St., Portland, Ore.

[59]

Robert M. Riculfi, Consolidated National Bank Bldg., Tucson, Ariz. ("The Sunshine City. KWWG

<sup>500</sup> 

	11	DEA DI TREQUENCIES AND DIAL NUMBERS
VOKW WBBR	30 1000	Cyril L. Parkins, Prescott, St., St. John's, Nfld. Peoples Pulpit Assn., 124 Columbia Heights, Brooklyn, N. Y. "The Watch Tower."
WEVD	500	Debs Memorial Fund, Inc., Hotel Claridge, Broadway and 44th St., New York, N. Y.
WFAB	1000	Fifth Ave. Broadcasting Corn. New York N. Y.
WHAZ	500	Fifth Ave. Broadcasting Corp., New York, N. Y. Rensselaer Polytechnic Institute, Eighth St., Troy, N. Y.
WIOD	1000	Isle of Dreams Broadcasting Corp., Herald Bldg., 208 S. Miami Ave., Miami,
woq	1000	Isle of Dreams Broadcasting Corp., Herald Bldg., 208 S. Miami Ave., Miami, Fla. "Wonderful Isle of Dreams." (NBC). Unity School of Christianity, 917 Tracy Ave., Kansas City, Mo.
	kiloc	ycles 228.9 meters
KCRJ KFBK	100 100	Charles C. Robinson, 711 Main St., Jerome, Ariz. James McClatchy Publishing Co., Sacramento Bee, Sacramento, Calif. (CBS)
KFGQ	100	<ul> <li>(CDS)</li> <li>Boone Biblical College, 924 W. 2nd St., Boone, Iowa.</li> <li>C. C. Baxter, 205 Grafton St., Dublin, Texas. "Dubin, Texas, Not Ireland."</li> <li>New Furniture Co., 2109 Park St., Greenville, Texas.</li> <li>Exchange Ave. Baptist Church, 535 Hightown Bldg., Oklahoma City, Okla.</li> <li>"Oklahoma's Own Broadcasting Station."</li> <li>Kirksey Brothers, Hotel Lubbook, Lubbook, Taxas. "Lubbook, Texas.</li> </ul>
KFPL KFPM	100 15	C. C. Baxter, 205 Gratton St., Dublin, Texas. "Dubin, Texas, Not Ireland."
KFXR	100	Exchange Ave. Bantist Church 535 Hightown Bldg Oklahoma City Okla
	100	"Oklahoma's Own Broadcasting Station."
KFYO	100	Kirksey Brothers, Hotel Lubbock, Lubbock, Texas. "Lubbock, Texas, The Hub of the Plains." KGBX, Inc., Springfield, Mo. E. E. Krebsbach, Wolf Point, Mont. "West Land Super Station."
KGBX KGCX	100 100	KGBA, Inc., Springheid, Mo.
KGEZ	100	E. E. Krebsbach, Wolf Point, Mont. "West Land Super Station." Donald C. Treloar, Box 1, Kalispell, Mont.
KGFW	100	Central Nebraska Broadcasting Corp., Midway Hotel, 25th & Central Ave., Kearney, Neb. "The Midway Station of the Nation."
KIFH	100	Kearney, Neb. "The Midway Station of the Nation."
KIT	100	Juneau Broadcasting Co., Juneau, Alaska. Valley Broadcasters, Inc., 109½ E. Yakima Ave., Yakima, Wash. "The Voice of the Yakima Valley."
KMED KRMD	100 100	Mrs. W. J. Virgin, Sparta Bldg., Medford, Ore. "Voice of a Great Country." KRMD, Inc., Jefferson Hotel, Shreveport, La. "Little Station Giving Big Results."
KINID	100	Results."
KTSM	100	Tri-State Broadcasting Co., Inc., 103 S. El Paso St., El Paso, Texas.
KXRO	100	Results." Tri-State Broadcasting Co., Inc., 103 S. El Paso St., El Paso, Texas. KXRO, Inc., Hotel Morck, Aberdeen, Wash. "Most Westerly Station in the U. S."
WAML	100	
WBEO	100	Lake Superior Broadcasting Co., 146 W. Washington St., Marguette Mich.
WBOW	100	Lake Superior Broadcasting Co., 146 W. Washington St., Marquette, Mich. Banks of Wabash, Inc., 6th & Wabash Sts., Terre Haute, Ind. "On Banks of the Wabash."
WBRE	100	Banks of the Wabash." Louis G. Baltimore, 16 N. Main St., Wilkes, Barre, Pa
WCLS	100	WCLS, Inc., 301 E. Jefferson St., Joliet, Ill.
WDAH	100	Tri-State Broadcasting Co., Inc., 200 S. El Paso St., El Paso, Texas.
WEBR	100	Louis G. Baltimore, 16 N. Main St., Wilkes-Barre, Pa. WCLS, Inc., 301 E. Jefferson St., Joliet, Ill. Tri-State Broadcasting Co., Inc., 200 S. El Paso St., El Paso, Texas. Howell Broadcasting Co., Inc., 735 Main St., Buffalo, N. Y. "The Golden Rule Station."
WEXL	50	Royal Oak Broadcasting Co., 244 Washington Square Bldg., Royal Oak, Mich. "Prosperity Station."
WFBG	100	The Gable Broadcasting Co., 1230-32 Eleventh Ave., Altoona, Pa. "The Voice of the Alleghenies."
WFDF WGAL	100 100	Frank D. Fallain, Union Industrial Bldg., Flint, Mich. WGAL, Inc., 810 W. King St., Lancaster, Pa. "Voice of Lancaster" (Lan-
WGH	100	caster Newspapers Bldg.)
WUAT	100	Hampton Roads Broadcasting Corp., 2813 Washington Ave., Newport News, Va. "World's Greatest Harbor."
WHAT WIAS	100	Independence Broadcasting Co., Box 16, Bethayres, Philadelphia, Pa.
		(Station at Ottumwa, Iowa) (Hotel Ottumwa).
WJAC	100	WJAC, Inc., 101 Main St., Johnstown, Pa.
WKAV	100	<ul> <li>Va. "World's Greatest Harbor."</li> <li>Independence Broadcasting Co., Box 16, Bethayres, Philadelphia, Pa.</li> <li>Iowa Broadcasting Co., 902 Register &amp; Tribune Bldg., Des Moines, Iowa. (Station at Ottumwa, Iowa) (Hotel Ottumwa).</li> <li>WJAC, Inc., 101 Main St., Johnstown, Pa.</li> <li>Laconia Radio Club, Laconia, N. H. "The Voice of the Lake Region" (Public Service Co. of New Hempshire Bldg.)</li> </ul>
WKBB	100	Laconia Radio Club, Laconia, N. H. "The Voice of the Lake Region" (Pub- lic Service Co. of New Hampshire Bldg.). Richard W. Hoffman, 510 Joliet National Bank Bldg., Joliet, III. "The Voice of Joliet."
WKBC	100	of Joliet." R B Broyles Furniture Co. 2021 Second Ave. No. Birmingham Ale
WLBC	50	R. B. Broyles Furniture Co., 2021 Second Ave. No., Birmingham, Ala. D. A. Burton and A. J. Marriott, Hotel Delaware, Muncie, Ind. "Voice of Eastern Indiana."
WMBO	100	Eastern Indiana." WMPO Ing Magazia Plda 10 Sauth St. Aukana N. Y
WNBH	100	WMBO, Inc., Masonic Bldg., 10 South St., Auburn, N. Y. New Bedford Broadcasting Co., 725 Pleasant St., New Bedford, Mass. (New
WOL WRAW	100 100	Reading Broadcasting Co., 533 Penn St. Reading Pa
WROL	100	Stuart Broadcasting Co., 524 S. Gav St., Knoxville, Tenn. (Farragut Hotel).
WSAJ	100	Grove City College, West and Broad St., Grove City, Pa.
WSJŚ	100	American Broadcasting Co., Annapolis Hotel, Washington, D. C. Reading Broadcasting Co., 533 Penn St., Reading, Pa. Stuart Broadcasting Co., 524 S. Gay St., Knoxville, Tenn. (Farragut Hotel). Grove City College, West and Broad St., Grove City, Pa. Winston-Salem Journal Co., 416-420 N. Marshall St., Winston-Salem, N. C. (Journal Sentinel Bldg.) (CBS). Foulkrod Radio Engineering Co., Inc. Buery Bldg. Broad and Frie Avee
WTEL	100	(Journal Sentinel Bldg.) (CBS). Foulkrod Radio Engineering Co., Inc., Buery Bldg., Broad and Erie Aves., Philadelphia, Pa. "Telling the City of Homes." Sun Publishing Co., Sun Bldg., Jackson, Tenn. "Voice of the Jackson Sun." Elkhart Daily Truth, Hotel Elkhart, Elkhart, Ind. Quintanila y Stevenson, P. O. Box 317, Monterrey, N. L., Mexico. "La Voz de Servicio." (1315). Carlos Cutierrez M. Volladolid 137, Morelia, Mich. Maxico. "Maraoria, El
WTIS	100	Sun Publishing Co., Sun Bldg., Jackson, Tenn. "Voice of the Jackson Sun"
WTJS WTRC	50	Elkhart Daily Truth, Hotel Elkhart, Elkhart, Ind.
XEFB	100	Quintanilla y Stevenson, P. O. Box 317, Monterrey, N. L., Mexico. "La Voz
XEI	150	de Servicio.'' (1315). Carlos Gutierrez M., Valladolid 137, Morelia, Mich., Mexico. ''Merceria El
	100	Porvenir."

				•			
1320	kilocy	rcles	227.1	meters			
CMCY	. 1000	Manuel I	). Autran	, Avenue de la I	dtes. 215, Ved	ado, Havana, Ci	uba. (1325).
KGHF KGMB	250 250	C. P. Rit Honolulu	Broadce	eo. J. Ikleman, 1 asting Co., 119 on with a Conso , Co., Inc., Par	Merchant St.,	P. O. Box 266	3, Honolulu,
	250	Hawaii	. "Stati	on with a Conso	cience." (CBS	i). Dadway, Idaho	Falls, Idaho,
KID		"Voice	of Idaho	,	K AVE. at Di		1 4110, 1041101
WADC WSMB	1000 500	Allan T. WSMB I	Simmons	6, P. O. Box 29, A Canal St., New	Akron, Ohio. Orleans, La.	(CBS). ''America's Mos	st Interesting
10 01010	500	City."	(NBC).	, P. O. Box 29, A Canal St., New			-
1000							I
1330	kilocy			meters	· · · · · · · · · · · · · · · · · · ·		
CMJI	45	Gilberto	Gessa Lo	pez, Independer (Los Bobos de	ncia No. 95, Ci Moda), (1335),	ego de Avila, Cu	iba. "La Voz
KGB	1000	Don Lee	Broadcas	(Los Bobos de sting System, 10 n Diego.'' (Pick Winthrop, Tack (Publishers	12 First St.,	San Diego, Cali	f. "The Don
кмо	250	Lee Sta KMO, In	ation, Sa c., Hotel	Minthrop, Tac	oma, Wash.	The Voice of T	acoma.''
KSCJ	1000	Perkins	Bros. Co.	Winthrop, Taco , (Publishers o idcasting Statio isylum St., Harr o Corp., 1329 An er Co., Hotel Eau er Wi, Wi (CBS	f Sioux City	Journal). Siou	x City, Iowa.
WDRC	500	WDRC, 1	nc., 11 A	sylum St., Har	ford, Conn.	(CBS).	<b>()</b>
WSAI WTAO	500 1000	The Cros	ley Radi	o Corp., 1329 Ai er Co., Hotel Ea	lington St., C u Claire, Eau C	Jaire, Wis. "W	TAQ, Gillette
WINQ	1000	Tires,	Eau Clair	e, Wis." (CBS	).		-
1240	1 .1		222 7				· · · · · · · · · · · · · · · · · · ·
	kilocy			meters			
KFPY	1000	Symons	Broadcas	ting Co., Symp ation of the Inl akota, Inc., 347 nd to Words th acting Co. San	ns Bldg., Spo and Empire.''	kane, Wash. (CBS).	"The Pioneer
KGDY	250	Voice of	South D	akota, Inc., 347	Dakota Ave.,	Huron, S. D.	"Radio Gives
WCOA	500	Pensacol	a prosoca	asting co., ban	Carlos Hotel,	Pensacola, Fla.	"Wonderful
WLEC	250		r Auvanta	ages." asting Co., Port			
WSPD	1000	The Tole	do Broad	casting Co., Cor	nmodore Perry	y Hotel, Toledo,	Ohio. (CBS)
1050		1	222.1	4			
1350	kilocy			meters	0.0.0		
KIDO	1000	C. G. Ph of Idal	illips and	l Frank Hill, Ho	tel Boise, Bois	e, Idaho. "KII	DO, the Voice
KWK	1000	Themas	Patrick, 1	Inc., Lindell & H	Kings Highway	Blvd., St. Loui	s, Mo. (Hote
WAWZ	250	Pillar of	. (Blue) Fire, Zar	ephath, N. J.	_		
WBNX	250	New Yor	k Metrop	olitan Broadcast	ing Corp., 1100	E. 177th St., Ne	w York, N. Y.
WCDA	250	Italian E	ducation	ephath, N. J. olitan Broadcast of the Bronx." al Broadcasting ollege, Emory, Va	Co., Inc., 225 L	afayette St., Ne	w York, N. Y.
WEHC	500						
WMSG	250	New Yor	k Metrop	olitan Broadcast Voice of the Bro	ing Corp., 1100	) E. 177th St., Ne	w York, N. H.
		W IVIS	G, Iwu	voice of the bio			
1360	kilocy	vcles	220.4	meters			
CMCR	150				35, Vibora, Hav	ana, Cuba. (13	865).
CMJP	7.5 1000	Cesar Ca	nals, Cal	lejas S-N, Moro	n, Cuba.	Long Beach, Ca	lif. (Remote
KGER		contro	1 from Lo	z, Milagros No. lejas S-N, Moro adcasting Co., 4 s Angeles). (Do roadway, Butte	byns Footwear	Bldg.). (NNR	C tips).
KGIR	500	KGIR, I (NBC)	nc., 121 B	roadway, Butte	Mont. "The	Voice of Monta	na at Butte.
WCSC	500	South C	aronna r	ful Charleston	South Coroling	, ''	, chanceton,
WFBL	1000	Onondag	a Radio I	Broadcasting Co	rp., Onondaga	Hotel, Syracuse	, N. Y. (CBS).
WGES	500	Oak Lea "In th	ves Broad e Heart o	Broadcasting Co leasting Station f Chicago." (G	, Inc., 4000 Wa uvon's Paradis	ashington Blvd. Be Ballroom).	, Chicago, III.
wjks	1000	Johnson	-Kennea	y Radio Corp., E	lks Temple Bl	lg., Gary, Ind.	"Voice of the
WOBC	500	Steel O Delta Br	oadcastir	ıg Co., Hotel Vic	ksburg Bldg.,	Vicksburg, Miss	. "The Post-
		Herald	I Station.	."			
1270	Initor	100	218 9	3 meters			
	kilocy				Candomas (	(1275)	
CMGE KCRC	$\begin{array}{r} 30 \\ 100 \end{array}$	Frid Ra	dionhone	Cespedes No. 18 Co., Oxford Ho Rucker Ave., Ev	tel. Enid. Okla		
KFBL	50	Leese Br	os., 2814	Rucker Ave., Ev th Dakota, Gran adcasters, Inc.,	erett, Wash. d Forks N D	"The Voice of I (Studie in Hot	verett." el Dakotah)
KFJM KFJZ	$\begin{array}{c} 100 \\ 100 \end{array}$	Fort W	orth Bro	adcasters, Inc.,	Texas Hotel,	(Studio in Hot Fort Worth, )	Texas. "Fort

Worth's Own Radio Station." (The Texas, a Baker Hotel).

KFLX	100	George Roy Clough, 3327 Ave. P, Galveston, Texas.
KGAR	100	Tucson Motor Service Co., 142-148 So. 6th Ave., Tucson, Ariz. "Voice of
KGDA	100	Tucson." Mitchell Broadcasting Corp., 206 First National Bank Bldg., Mitchell, S. D.
KGFG	100	"The Voice of Progress." Oklahoma Broadcasting Co., Inc., 1113 No. Broadway, Oklahoma City, Okla. "Keep Going for God." (Oklahoma City Evangelistic Tabernacle).
		"Keep Going for God." (Oklahoma City Evangelistic Tabernacle).
KGFL	100	KGFL, Inc., San Francisco St., Santa Fe, N. M. "The Voice of the Mountains." KGKL, Inc., St. Angelus Hotel, San Angelo, Texas.
KGKL	100	KGKL, Inc., St. Angelus Hotel, San Angelo, Texas.
KICA	100	Southwest Broadcasting Co., Clovis, N. Mex.
KMAC	100	Walmac Co., Inc., Blue Bonnet Hotel, San Antonio, Texas. "San Antonio,
VONO	100	Texas, the Westpoint of the Air."
KONO	100	Mission Broadcasting Co., St. Anthony Hotel, San Antonio, Tex.
KOOS	100	H. H. Hanseth, Inc., Hall Bldg., Marshfield, Ore. "The Voice of KOOS Bay."
KRE	100	First Congregational Church of Berkeley, 1091 Telegraph Ave., Oakland, Calif. (Studio in Berkeley, Calif.)
KSO	100	Iowa Broadcasting Co., Register and Tribune Bldg., Des Moines, Iowa. (Blue).
KUJ	100	KUJ, Inc., Marcus Whitman Hotel, Walla Walla, Wash. "Walla Walla's Home Station."
KVL	100	KVL, Inc., Fifth Ave. and Virginia St., Seattle, Wash.
KWKC	100	Wilson Duncan Broadcasting Co., 39th and Main Sts., Kansas City, Mo.
WBTM	100	Piedmont Broadcasting Corp., 427 Main St., Danville, Va. "World's Best
		Tobacco Market." (Danville Hotel).
WCBM	100	Baltimore Broadcasting Corp., 114 N. Lexington St., Baltimore, Md. "The
		Voice of Keith."
WDAS	100	WDAS Broadcasting Station, Inc., Broad and Vine Sts., Philadelphia, Pa. "May You Laugh in Your Dreams" (at closing time). (Elks Hotel).
WGL	100	F. C. Zieg, 215 N. Main St., Fort Wayne, Ind. (CBS).
WGLC	50	O. T. Griffin & G. F. Bissell, Colonial Display House, Hudson Falls, N. Y.
WHBD	100	F. P. Moler, Mount Orab, Ohio. "The Hundred Watt Station That Covers
WIIDD	100	the Nation."
WHBO	100	Broadcasting Station WHBQ, Inc., Hotel Claridge, Memphis, Tenn. "The
	100	Friendly Station."
WHDF	100	Upper Michigan Broadcasting Co., 109 Fifth St., Calumet, Mich. "Where
WIBM	100	Copper is King."
WJBK	100	WIBM, Inc., Otsego Hotel, Jackson, Mich. James F. Hopkins, Inc., 6559 Hamilton Ave., Detroit, Mich. "WJBK, in the
•		Curtiss Bldg."
WJEQ	100	WRAK, Inc., 442 Williams St., Williamsport, Pa.
WJTĽ	100	Oglethorpe University, Oglethorpe University Post Office, Georgia. (Studio in Atlanta). (Yaarab Shrine Mosque).
WLEY	100	Albert S. Moffat, Adams St., Lexington, Mass. "Voice of the Minute Man."
WLVA	100	Lynchburg Broadcasting Corp., 915 Main St., Lynchburg, Va. "In the Heart of Old Virginia."
WMBR	100	F. J. Reynolds, 907 Florida Ave., Tampa, Fla. (Hotel Florida).
WPFB	100	F. J. Reynolds, 907 Florida Ave., Tampa, Fla. (Hotel Florida). Hattiesburg Broadcasting Co., Box 530, Hattiesburg, Miss. "The Voice of the Pines." (Hotel Hattiesburg).
WODM	100	A. J. St. Antoine and E. J. Regan, 16 Kingman St., St. Albans, Vt.
WRAK	100	WRAK, Inc., 442 Williams St., Williamsport, Pa., "The Greatest Little One-
		WRAK, Inc., 442 Williams St., Williamsport, Pa. "The Greatest Little One- Horse Station in the World." (Studio in the Penn Central Bldg. and sta-
		tion atop the First National Bank Bldg.).
WRAM	100	Wilmington Radio Assn., Inc., Box 258, Princess Street Road, Wilmington, N. C.
WRDO	100	WRDO, Inc., Augusta House, Augusta, Maine.
WRJN	100	Racine Broadcasting Corp., Main and 6th Sts., Racine, Wis. (Hotel Racine).
WSVS	50	Seneca Vocational High School, 666 E. Delevan Ave., Buffalo, N. Y. "Watch
	•••	Seneca Vocational School."
XEFV	100	Jose Onofre Meza, Ciudad Juarez, Chih., Mexico.
1380	kilocy	ycles 217.3 meters
CMJC	150	Feliciano Isaac, Cisneros y G. Gomez, Camaguey, Cuba. (1382).
кон	500	McClatchy Newspapers, 440 N. Virginia St., Reno, Nev. "The Voice of Newada" (CBS)
KOV	500	Nevada." (CBS). KQV Broadcasting Co., Investment Bldg., Pittsburgh, Pa. "Voice of Pitts-
···	000	burgh."

- WKBH, Inc., 407 Main St., LaCrosse, Wis. (Radio Bldg.). (CBS). Stanley M. Krohn, Jr., 20th floor, U. B. Bldg., Dayton, Ohio. Jose A. Berumen, Torreon, Coah., Mexico.
- WKBH WSMK XETB 1000 200 125

#### 1390 kilocycles 215.7 meters

- Julio Powers, Quinta 476, Vedado, Havana, Cuba. (1395). Arkansas Broadcasting Co., Albert Pike Hotel, Little Rock, Ark. "Voice of Arkansas." (CBS). Nielson Radio & Sporting Goods Co., 621 N. Central Ave., Phoenix, Ariz. "The Radio Voice of Arizona." (CBS). Southwestern Hotel Co., Fort Smith, Ark. "Voice of the Ozarks." (Station in Fourtearille Ark.) CMDB KLRA 40 1000 KOY
- 500 KUOA
  - 1000 in Fayetteville, Ark.)

WHK	1000	Radio Air Service Corp., 1311 Termi		"Cleveland's
		Pioneer Broadcasting Station."	(On the Higbee Store). (Cl	BS).

# 1400 kilocycles 214.2 meters

CMCH	50	Wifredo & Humberto Fontanals Sanchez, 88 Primellas St., Cerro, Havana, Cuba. (1405).
CMCM	15	Aurelio Balino, Belas Coain No. 639, Havana, Cuba. (1405).
KLO	500	Interstate Broadcasting Corp., 405 25th St., Ogden, Utah. (Hotel Bigelow).
KOCW	250	J. T. Griffin, 1800 So. 18th St., Chickasha, Okla.
WBAA	500	Purdue University, School of Electrical Engineering, Lafayette, Ind.
WBBC	500	Brooklyn Broadcasting Corp., 16 Court St., Brooklyn, N. Y. "Brooklyn's Own Station." (Montague Court Bldg.).
WCGU	500	United States Broadcasting Corp., 427 Flatbush Ave. Extension, Brooklyn, N.Y. "At the Hub of Brooklyn."
WFOX	500	Paramount Broadcasting Co., I Nevins St., Brooklyn, N. Y. "In the Fox Theatre Bldg."
WKBF	500	Indianapolis Broadcasting, Inc., 540 N. Meridian St., Indianapolis, Ind. "The Voice of the Capitol."
WLTH	500	Voice of Brooklyn, Inc., 305 Washington St., Brooklyn, N. Y. "Voice of Brooklyn." (Brooklyn Eagle Bldg).

## 1410 kilocycles 212.6 meters

KFLV	500	Rockford Broadcasters,	Inc., 107 S. Water St., Rockford, Ill.	"The Voice of
		Rock River Valley."	(Rockford News Tower).	

- 1000 KGRS
- E. B. Gish, Bellaire Park, Amarillo, Texas. Bay State Broadcasting Corp., 1 Winter Place, Boston, Mass. (Hotel Buck-WAAB 500 minister). (CBS).

Minister). (CDS). James E. Davidson, Wenonah Hotel, Bay City, Mich. "The Voice of North-eastern Michigan." "Where the Summer Trails Begin." (CBS). National Radio & Broadcasting Corp., 300 Polk St., P. O. Box 306, Amarillo 500 WRCM 1000 WDAG

- 500 WHBL
- Texas. (Hotel Amarillo). The Press Publishing Co., 7th St. and Center Ave., Sheboygan, Wis. Daily Telegraph Printing Co., Inc., Bland St., Bluefield, W. Va. (West Vir-WHIS 250 ginian Hotel).

500 WODX

gman rotes). Mobile Broadcasting Corp., Battle House Hotel, Mobile, Ala. "Where Old Dixis Xports." (CBS). Richmond Development Corp., 20 Salem Ave., S. E., Roanoke, Va. "The Southern Gateway to the Shenandoah Valley." (Crystal Springs Studio). Montgomery Broadcasting Co., Inc., Jefferson-Davis Hotel, Montgomery, Ala. "Montgomery, Home of the South's Finest Airport." (CBS). 250 WRBX 500 WSFA

1420	kilocycles	211.1	meter	s			
		D 1	· C I	222 T	and an Dida 9	San Antonio	Taras

- Alamo Broadcasting Co., Inc., 223 Texas Theatre Bldg., San Antonio, Texas. Student Body, Benson Polytechnic School, East 12th and Hoyt Sts., Portland, KABC KBPS 100 100 Ore. Texarkana Gazette and Texarkana Daily News, Hotel Grim, Texarkana, Ark. Reporter Printing Co., 18 W. 1st St., Fond du Lac, Wis. KGFF Broadcasting Co., 9th and Bell Sts., Shawnee, Okla. "Voice of the Indian Territory." (Aldridge Hotel). Golden Gate Broadcasting Co., 2482 Mission St., San Francisco, Calif. "First Station on the Dial." "Official Station of San Francisco Labor Council." Leonard E. Wilson, 326 No. Commercial St., Trinidad, Colo. J. M. Heaton, P. O. Box 656, Las Vegas, Nevada. "The Voice of Boulder Dam." Sand Point Broadcasting Co., Lewiston, Idaho. Red Oak Radio Corp., 601 Summitt St., Red Oak, Iowa. Lamar Broadcasting Co., Box 688, Lamar, Colo. Frank L. Hill & Curtiss G. Phillips, 733 Willamette St., Eugene, Ore. "The City With A Smile of Welcome." Dr. Albert H. Schermann, P. O. Box 267, Yuma, Ariz. (Mesa Drug Store KCMC 100 KFIZ 100
- KGFF 100
- KGGC 100
- KGIW 100 100 KGIX
- KGKX 100
- KICK 100
- KIDW 100
- KORE 100
- Albert H. Schermann, P. O. Box 267, Yuma, Ariz. (Mesa Drug Store KUMA 100 Dr. Bidg.)
- Cedar Rapids Broadcast Co., 7th floor Hotel Montrose, Cedar Rapids, Iowa. 100 KWCR (Blue).

KXL Broadcasters, 269 Pine St., Portland, Ore. "KXL, the Voice of Portland." 100 KXL (Hotel Multnomah.)

- (Hotel Multnomah.) Aroostook Broadcasting Corp., Main St., Presque Isle, Maine. "Wonderful Aroostook, the Garden of Maine." (Presque Isle National Bank Bldg.) Raymond C. Hammett, 1200 Noble St., Anniston, Ala. "The Voice of An-niston, the Model City." (Alabama Hotel.) Hazelton Broadcasting Service, Inc., Hazelton, Pa. WEHS, Inc., 6138 W. 22nd St., Cicero, Ill. Enquirer News Co., 7 N. McCamly St., Battle Creek, Mich. Americus Broadcasting Co., Rylander Bldg., Americus, Ga. "Americus, Ga., the Garden Spot of Dixie." 100 WAGM
- 100 WAMC
- 100 WAZL
- WEHS 100
- WELL 50 WENC 100
- 100 WERE
- Ga., the Garden Spot of Dixie." Erle Broadcasting Cor., Lawrence Hotel, Erle, Pa. "Voice of Erle." Tupper Lake Broadcasting Cor., Inc., Iroquois Hotel, Tupper Lake, N. Y. "The Voice in the Clouds." 100 WHDI.

WHFC	100	WHFC, Inc., 6138 West 22nd St., Cicero, Ill. "Voice of the West Towns."
WILM	100	Delaware Broadcasting Co., 920 King St., Wilmington, Del.
WJBO	100	Baton Rouge Broadcasting Co., Inc., 119 So. St. Patrick St., New Orleans, La.
WĬMS	100	WIMS, Inc., St. James Hotel, Ironwood, Mich. "The Voice of the Range."
WKBI	100	WKBI, Inc., 6138 West 22nd St., Cicero, Ill.
WLBF	100	WLBF Broadcasting Co., Huron Bldg., Kansas City, Kansas. (Aladdin
		Hotel).
WMAS	100	WMAS, Inc., Hotel Stonehaven, Springfield, Mass. "Voice of Western
		Massachusetts." (CBS).
WMBC	100	The Michigan Broadcasting Co., 7310 Woodward Ave., Detroit, Mich.
		Storn-feltz-Loveley Bldg.)
WMBH	100	W. M. Robertson, 1334 Roosevelt St., Joplin, Mo. "The Voice of the Great
		Four-State District."
WPAD	100	Paducah Broadcasting Co., Inc., 2201 Broadway, Paducah, Ky. "Voice of
		Western Kentucky. <sup>8</sup> (Ritz Hotel).
WSPA	100	Voice of South Carolina, Virgil B. Evans, Radio Center, Spartanburg, S. C.
WTBO	100	Associated Broadcasting Corp., P. O. Box 794, Cumberland, Md. (Com-
		mercial Savings Bank).

## 1430 kilocycles 209.7 meters

KECA	1000	Earle C. Anthony, Inc., 1000 S. Hope St., Los Angeles, Calif. "E. C. A., Inc.,
		Distributor of Packard and Hudson-Essex Motor Cars for California."
VONE	500	(NBC). Creat Blains Broadcasting Co., 1500 Black West 12th St. North Blatta Nah

- Great Plains Broadcasting Co., 1500 Block, West 12th St., North Platte, Neb. Commonwealth of Pennsylvania, Pennsylvania State Police, Capitol Bldg., Harrisburg, Pa. "The Voice of Pennsylvania." Commercial Radio Service Co., Hotel Fort Hayes, Columbus, Ohio. "Pioneer Broadcasting Station." (CBS). WBAK 1000
- WCAH 500
- WFEA 500 WHEC
- 500 WHP 500
- Broadcasting Station." (CBS).
  New Hampshire Broadcasting Co., Carpenter Hotel, Manchester, N. H. (CBS).
  WHEC, Inc., 40 Franklin St., Rochester, N. Y. "All Day Broadcasting Station." (Rochester Savings Bank Bldg.). (CBS).
  WHP, Inc., Telegraph Bldg., 216 Locust St., Harrisburg, Pa. "WHP, the Harrisburg Telegraph, Central Pennsylvania's Greatest Daily." (CBS).
  Memphis Broadcasting Co., Hotel Devoy, Memphis, Tenn. "On the Mississippi." (Relays WLW and WSM) (WGBC).
  WOKO, Inc., Hotel Ten Eyck, Albany, N. Y. (CBS). WNBR 500
- 500 WOKO

## 1440 kilocycles 208.2 meters

CMBL	20	Julio C. Hidalgo, Zapata 150, Ent., 6 y 8 Vedado, Havana, Cuba. (1445)
KDFN	500	Donald C. Hathaway, Hotel Townsend, Casper, Wyo.
KLS	250	Warner Bros., 2201 Telegraph Ave., Oakland, Calif.
KXYZ	250	Harris County Broadcast Co., Fannin & Rusk Sts., Houston, Texas. "Every- body's Station." (Texas State Hotel).
WBIG	500	North Carolina Broadcasting Co., Inc., P.O. Box 408, Greensboro, N. C. (O. Henry Hotel and Jefferson Standard Bldg.). (CBS). B. Bryan Musselman, 39-41 N. 10th St., Allentown, Pa. "This is the Queen
WCBA	250	B. Bryan Musselman, 39-41 N. 10th St., Allentown, Pa. "This is the Queen City's Radio Station."
WMBD	500	Peoria Broadcasting Co., 114 N. Madison St., Peoria, Ill. "From the Heart of Illinois." (CBS).
WSAN	250	Allentown Call Publishing Co., Inc., 101 N. 6th St., Allentown, Pa.
WTAD	500	Illinois Broadcasting Corp., 600 State St., Quincy, Ill.

## 1450 kilocycles 206.8 meters

KTBS	1000	Tri-State Broadcasting System, Inc., P.O. Box 1642, Shreveport, La. (Washington-Youree Hotel) (NBC).
WGAR	500	WGAR Broadcasting Co., Inc., Hotel Statler, Cleveland, Ohio. "Cleveland's Friendly Station." (Blue).
WHOM	250	New Jersey Broadcasting Corp., 2870 Boulevard, Jersey City, N. J. "The Voice of the New Metropolis." (NNRC tips).
WSAR	250	Doughty and Welch Electric Co., Inc., 10 Bedford St., Fall River, Mass. "The Voice of Fall River."
WTFI	<b>50</b> 0	Liberty Broadcasting Co., Costa Bldg., Athens, Ga. "Home of Costa's Icecream, Just a Little Better." (NNRC tips).
XEAB	7.5	Humberto Garcia R., Nuevo Laredo, Tams., Mexico.

## 1460 kilocycles 205.4 meters

KSTP 25000 National Battery Broadcasting Co., St. Paul Hotel, St. Paul, Minn. (St. Paul Hotel, St. Paul, and Radisson Hotel, Minneapolis) (NBC). Old Dominion Broadcasting Co., 1218 Shoreham Bldg., Washington, D. C. "The Voice from the Nation's Capital." (Station in Alexandria, Va.) 10000 WJSV

CBS).

1470	kilocy			meters			1	
KGA	5000	Northwes	t Broadce	sting System,	1023 West Riv	verside Ave	., Spokane, V	Nash
WLAC	5000	Life & Ca	te Assura isualty In Station.''	nce Bldg.) (Bl surance Co., 1 (CBS).	ue). 59 Fourth Ave	e. N., Nash	ville, Tenn.	"The
1480	kilocy			meters			1	
CMBK	15	Alberto A	lvarez, Pa	ula y Oficios, I	Iavana, Cuba	(1485).	<u> </u>	1 40 51
CMBR KOMA	$\begin{array}{r} 40 \\ 5000 \end{array}$	Tomas Ba	Radio M	nue 6 Entre F. anufacturing (	y G., Arroyo J Co., Oklahom	a-Biltmore	ana, Cuba ( Hotel, Okla	1485). homa
ROMA	3000	City, O	kla. (CB	S).				
WKBW	5000	Buffalo B	roadcasti	ng Corp., Rand	Bldg., Buffal	o, N. Y. (	CBS).	
1490	kilocy			meters				
WCKY	5000	L. B. Will Cincini	son, Inc., nati's Mos	6th & Madiso st Popular Stor	n Sts., Coving e.'' (NBC).	ton, Ky.	"Mabley & C	arew
1500	kilocy	cles	199.9	meters				
KDB	100	Santa Ba	irbara Br	oadcasters, Lt n Lee Station."	d., 15-17 Eas	t Haley S	t., Santa Bar	rbara,
KGFI	100	eagle Bro	ous Christ	i.'' (Plaza Ho	). Box 1508, C tel).	orpus Chri	sti, lexas.	'Voice
KGFK	100	Red River	r Broadca	sting Co., Inc.,	722 Center A	ve., Moorh	ead, Minn. (	Com-
KGIZ KGKB	$100 \\ 100$	Grant Ci East Tex	ty Park as Broad	Corp., Grant ( leasting Co., of East Texas."	Tyler Commo	he voice o ercial Coll	ege, Tyler,	'ark.'' Fexas.
KGKY	100	Hilliard	Co., Inc.,	of East Texas." 1517½ Broady tte Valley."	vay, Scottsblu	iff, Neb.	"KGKY, the	Voice
KNOW	100	KUT Bro	adcasting adio Stati	g Co., Driskill ion with Studio	os in the Drisk	ill Hotel."	"KNOW, Au	
крјм	100	Scott and	i Sturm, I	Union & Cortez	sts., Prescott	., Ariz. v	once of the M	
KPQ	100	Westcoas mand	t Broadca the Air an	asting Co., Ca d You Comma	scadian Hotel ind the Marke	, Wenatch t.''	ee, Wash. "	'Com-
KREG	100	Voice of C	Orange Ei	npire, Inc., 3rd	A Sycamore	Sts., Santa	a Ana, Calir.	
KXO WFDV	$100 \\ 100$	Rome Br	oadcastin	A. Bowles, 893 g Corp., 10 Thi 1 Produce Co.,	rd Ave., Rome	Ga. "Vo	ice of Seven H	Hills."
WHEF	100	Attala M	illing and	Produce Co.,	417 West Ada	ms St., Ko	sciusko, Miss	s.
WKBV	100	William	O. Knox,	Box 286, Conne First National	rsville, Ind.	C	<b>T</b> 1.	
WKBZ	100	"Ludir	ngton on t	the Lake, the L	ittle City Wid	e Awake."	, Ludington,	Mich.
WKEU	100 100	Marshall Roston F	and Mal	colm, La Grang	con St Bost	on Mass	"Greater Bo	eton'e
WLOE	100	Only L	ocal Radi	o Station.'' (I	Totel Bellevue	).	Greater Do	stons
WMBQ	) 100	Paul J. C	Gollhofer,	95 Leonard St.	, Brooklyn, N.	Y. "Hon	ne Sweet Hon	ne.''
WMIL	100	Arthur I	Faske, 15	colm, La Grang ng Co., 21 Bea o Station.'' (I 95 Leonard St. 25 Pittkin Avo badcasting Stat	Brooklyn,	N. Y. "I	Brooklyn's Pi	remier
WMPC	100	ine rus	st ivietno	oadcasting Stat dist Protestan reach Christ."	t Church, 81	Liberty	St., Lapeer,	Mich.
WNBF	100	Howitt-V	Vood Rad	io Co., Inc., Ar	lington Hotel	Bingham	ton, N. Y.	
WOPI	100	Radiopho	one Broad	Icasting Static	n WOPI, Inc	., 22nd &	State Sts., B	
WPEN	100	Wm. Per	n Broade	asting Co., 217 9 Eighth St., A	So. Broad St.	, Philadelp	hia, Pa.	
WRDW	100	(Relays	sWLW).				e of Augusta	, Ga.''
WSYB	100	Philip W	eiss Musi	c Co., 80 West	St., Rutland,	Vt. Woodeida	N Y "TL	Voice
WWRL	. 100	Long Isla	and Broad	lcasting Co., 4 ty." (NNRC t	ios).	moouside,	in in ine	voice
wwsw		Walker a	nd Down	ing Radio Corp	., Hotel Scher	iley, Pittsb	urgh, Pa.	
XEFZ	100	Manuel 2	etina, Co	oyoacan, Mexic	o City, Mexico	).		

Atlantic	1:00	2:00	3:00	4:00	5:00	6:00	7:00	8:00	9:00	10:00	11: <b>0</b> 0	12:00
Eastern	12:00	1:00	2:00	3:00	4:00	5:00	6:00	7:00	8:00	9:00	10:00	11:00
Central	11:00	12:00	1:00	2:00	3:00	4:00	5:00	6:00	7:00	8:00	9:00	10:00
Mountain	10:00	11:00	12:00	1:00	2:00	3:00	4:00	5:00	6:00	7:00	8:00	9:00
Pacific	9:00	10:00	11:00	12:00	1:00	<b>2:0</b> 0	3:00	4:00	5:00	6:00	7:00	8:00

## TIME CONVERSION TABLE

### INDEX BY CALL LETTERS

CFAC	690		CMCD		Havana, Cuba, EST.	KFH	1300	
CFBO CFCA	890 1120		CMCF CMCH	890 1405	Havana, Cuba, EST. Havana, Cuba, EST.	KFI KFIO	640 1120	Los Angeles, Calif., PST. Spokane, Wash., PST.
CFCF	1030	Montreal, Que., EST	CMCJ	1185	Havana, Cuba.	KFIZ	1420	Fond du Lac, Wis., CST.
CFCH CFCN	910 985		CMCN CMCN		Havana, Cuba. Havana, Cuba.	KFJB KFJI	1200 1210	Marshalltown, Iowa. Klamath Falls, Ore.
CFCO	1010	Chatham Ont EST	CMCQ	780	Havana, Cuba. Havana, Cuba.	KFJM	1370	Grand Forks, N. D.
CFCT CFCY	630 580	Victoria, B. C., PST. Charlottetown, P. E. I.	CMCR CMCU	630	Havana, Cuba. Havana, Cuba.	KFJR KFJZ	1300 1370	Portland, Ore. PST. Fort Worth, Texas, CST.
CFJC CFLC	1120 915	Kamloops, B. C., PST.	CMCW CMCX	965	Havana, Cuba, EST.	KFKA KFKU	880 1220	Greeley, Colo., MST.
CFNB	1210	Fredericton, N.B., AST.	CMCY	1325	Havana, Cuba. Havana, Cuba, <i>EST</i> .	KFKX	1020	Lawrence, Kans., CST. Chicago, Ill.
CF QC CF RB	910 690	Saskatoon, Sask, Toronto, Ont., <i>EST</i> .	CMDB CMDD		Havana, Cuba. Havana, Cuba.	KFLV KFLX	1410 1370	Rockford, Ill., CST. Galveston, Texas.
CFRC	930	Kingston, Ont.	CMDE	925	Havana, Cuba	KFMX	1250	Northfield, Minn., CST.
СНСН СНСК	1200 960	Montreal, Que. Charlottetown, P. E. I.	CMGA CMGB	834 1205	Colon, Cuba. Matanzas, Cuba,	KFNF Kfor	890 1210	Shenandoah, Iowa.CST. Lincoln, Nebr., CST.
CHGS	1120	Summerside, P. E. I.	CMGC	820	Matanzas, Cuba.	KFOX	1250	Long Beach, Calif., PST
CHLP Chls	1200 730	Montreal, Que. Vancouver, B. C., <i>PST</i> .	CMGE CMGF	1375 987	Cardenas, Cuba, EST. Matanzas, Cuba.	KFPL KFPM	1310 1310	Dublin, Texas, CST. Greenville, Texas, CST.
CHMA Chml	580 880	Edmonton, Alta., <i>MST</i> , Hamilton, Ont., <i>EST</i> .	CMGH CMHC	1040 790	Matanzas, Cuba	KFPW KFPY	1210	Fort Smith, Ark., CST,
CHNC	840	Toronto, Ont.	CMHD	950	Tuinucu, Cuba. Caibarien, Cuba.	KFQD	1340 1230	Spokane, Wash., PST. Anchorage, Alaska.
CHNS Chrc	815 645	Halifax, N. S., AST. Quebec, Que., EST.	СМНІ Смнј	1030 1125	Santa Clara, Cuba, EST. Cienfuegos, Cuba, EST.	KFRC KFRU	610 630	San Francisco, Calif. Columbia, Mo., CST.
CHWC	960	Regina, Sask. MST. Chilliwack, B. C., PST.	СМНК	1225	Cruces, Cuba.	KFSD	600	San Diego, Calif., PST.
CHWK Chyc	665 730	Chilliwack, B. C., PST. Montreal, Que.	CMHL CMJC	1290 1382	Cienfuegos, Cuba. Camaguey, Cuba.	KFSG KFUL	1120 1290	Los Angeles, Calif. PST. Galveston, Texas, CST.
CJCA CJCB	745 880	Edmonton, Alta., MST.	CMJE	1175	Camaguey, Cuba.	KFUO	550	St. Louis, Mo., CST.
CJCJ	690	Sydney, N. S., AST. Calgary, Alta., MST.	CMJF CMJG	930 1050	Camaguey, Cuba. Camaguey, Cuba.	KFVD KFVS	1000 1210	Los Angeles, Calif., PST Cape Girardeau, Mo.
CIGX	595 630	London, Ont., EST. Yorkton, Sask., CST.	CMJH CMJI	1150 1335	Ciego de Avila, Cuba, Ciego de Avila, Cuba,	KFWB KFWF	950 1200	Los Angeles, Calif., PST St. Louis, Mo., CST.
CIOC	1120	Lethbridge, Alta., MST.	CMJK	790	Camaguey, Cuba	KFWI	930	San Francisco Calif
CJOR Cjrm	1210 665	Vancouver, B. C., PST. Moose Jaw, Sask. MST.	CMJL CMJN	960 1240	Camaguey, Cuba Camaguey, Cuba.	KFXD KFXF	1200 920	Nampa, Idaho, MST. Denver, Colo., MST. Grand Jct., Colo., MST
CJRW	665	Fleming, Sask., MST.	CMJO	1110	Ciego de Avila, Cuba.	KFXJ	1200	Grand Jet., Colo., MST
CKAC CKCD	730 730	Montreal, Que., EST. Vancouver, B. C.	CM JP CMK	1360 730	Moron, Cuba. Havana, Cuba, EST.	KFXM KFXR	1210 1310	San Bernardino, Calif. Oklahoma City, Okla.
CKCI CKCK	645 960	Quebec, Que., EST. Regina, Sask., MST.	CMKC CMKJ	1034	Santiago, Cuba.	KFYO Kfyr	1310	Lubbock, Texas, CST.
CKCL	580	Toronto, Ont., EST.	СмQ	1300 630	Guantanamo, Cuba. Havana, Cuba.	KGA	550 1470	Bismarck, N. D., CST, Spokane, Wash., PST.
CKCO CKCR	890 645	Ottawa, Ont. Waterloo, Ont. EST.	C M W C M X	590 890	Havana, Cuba, EST. Havana, Cuba, EST.	KGAR Kgb	1370 1330	Tucson, Ariz., MST. San Diego, Calif., PST.
CKCV	880	Quebec, Que., EST.	CNRA	630	Moncton N. B. AST.	KGBU	900	Ketchikan, Alaska.
CKFC CKGW	730 840	Vancouver, B. C. Toronto, Ont., EST.	CNRH CNRO	815 600	Halifax, N. S., AST. Ottawa, Ont., EST.	KGBX KGBZ	1310 930	Springfield, Mo., CST. York, Neb., CST.
CKIC CKLC	1010 840	Wolfville, N. S., AST. Red Deer, Alta. MST.	CNRV Cpry	1030 840	Vancouver, B. C., PST. Toronto, Ont., EST.	K G C A K G C R	1270 1210	Decorah, Iowa, CST. Watertown, S. D., CST.
CKMC CKMO	1210	Cobalt, Ont., EST.	ннк	920	Port-au-Prince, Haiti.	KGCU	1240	Mandan, N. D. MST.
CKMO	730 960	Vancouver, B. C. Toronto, Ont., EST.	HIX HJN	579 685	Santo Domingo, EST. Bogota, Colombia.	KGČX Kgda	1310 1370	Wolf Point, Mont. MST. Mitchell, S. D., CST.
CKOC	635 540	Hamilton Ont EST	KABC Kale	1420 1300	San Antonio, Tex., CST.	KGDE KGDM	1200	Fergus Falls Minn
CKOK Ckov	1200	Windsor, Ont., EST. Kelowna, B. C., PST. Preston, Ont., EST.	KARK	890	Portland, Ore., <i>PST</i> Little Rock, Ark., <i>CST</i> .	KGDY	1100 1340	Huron, S. D., CST.
CKPC CKPR	930 890	Preston, Ont., EST. Ft. William, Ont., EST.	KASA KBPS	1210 1420	Little Rock, Ark., CST. Elk City, Okla., CST. Portland, Ore., PST.	KGEK Kger	1200 1360	Stockton, Calif., PST. Huron, S. D., CST. Yuma, Colo., MST. Long Beach, Calif., PST.
СКТВ	635	St. Catharines Ont	КВТМ	1200	Paragould, Ark., CST.	KGEW	1200	rt. Worgan, Colo., MST,
CKUA Ckwx	580 730	Edmonton, Alta., MST. Vancouver, B. C., PST. Brandon, Man., CST.	KCMC KCRC	1420 1370	Texarkana, Ark., CST. Enid, Okla., CST.	KGEZ KGFF	1310 1420	Kalispell, Mont., MST. Shawnee, Okla., CST.
CKX CKY	930 780	Brandon, Man., CST.	KCRJ Kdb	1310 1500	Jerome, Ariz., MST. Santa Barbara, Calif.	KGFG KGFI	1370 1500	Oklahoma City, Okla. Corpus Christi, Texas.
CMAB	1249	Winnipeg, Man., CST. Pinar del Rio, Cuba.	KDFN	1440	Casper Wyo MST	KGFJ	1200	Los Angeles, Calif,
CMAF Cmay	680 965	Havana, Cuba, EST. Havana, Cuba	KDKA Kdlr	980 1210	Pittsburgh, Pa., EST. Devils Lake, N. D. CST. Salt Lake City, Utah	KGFK KGFL	1500 1370	Moorhead, Minn., CST. Santa Fa N. M. MST.
CMBC	1270	Havana, Cuba. Havana, Cuba, EST.	KDYL	1290	Salt Lake City, Utah	KGFW	1310	Santa Fe, N. M., MST. Kearney, Neb., CST. Pierre, S. D.
CMBD CMBF	965 1325	Havana, Cuba. Havana Cuba.	KEČA Kelw	1430 780	Los Angeles, Calif., PST	KGFX KggC	630 1420	Pierre, S. D. San Francisco, Calif.
CMBG CMBJ	1070 1140	Havana, Cuba. Hawana, Cuba	KERN Kex	1200 1180	Bakersfield, Calif., PST.	KGGF	1010	Coffeyville, Kans., CST.
СМВК	1485	Havana, Cuba. Havana, Cuba.	KFAB	770	Portland, Ore., PST. Lincoln, Neb., CST.	KGGM KGHF	1230 1320	Albuquerque, N. M. Pueblo, Colo., MST.
CMBL CMBN	1445 1185	Havana, Cuba, EST. Havana, Cuba, EST.	KFAC KFBB	1300 1280	Los Angeles, Calif., PST. Great Falls, Mont., MST.	KGHI Kghl	1200 950	Little Rock, Ark., CST. Billings, Mont., MST.
CMBR	1485	Havana, Cuba. Havana, Cuba.	KFBI	1050	Abilene, Kans., CST.	KG1R	1360	Butte, Mont., MST.
CMBS CMBW	780 925	Havana, Cuba.	KFBK KFBL	1310 1370	Sacramento, Calif., PST. Everett, Wash., PST.	KGIW KGIX	1420 1420	Trinidad, Colo., MST. Las Vegas, Nev., PST.
CMBY CMBZ	1230 1010	Havana, Cuba. Havana, Cuba, EST.	KFDM KFD	560 550	Beaumont, Tex., CST.	KGIZ	1500 1500	Grant City, Mo., CST,
CMC	840	Havana, Cuba.	KFEL	920	Brookings, S. D., CST. Denver, Colo. MST.	KGKB KGKL	1370	Tyler, Texas, CST. San Angelo, Texas, CST.
CMCA CMCB	1230 1070	Havana, Cuba. Havana, Cuba, EST.	KFEQ KFGQ	680 1310	St. Joseph, Mo., CST. Boone, Iowa, CST.	KGKO KGKX	570 1420	Wichita Falls, Texas. Lewiston, Idaho.
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### INDEX BY CALL LETTERS

					0. p 1.)/: 000
KGKY	1500	Scottsbluff, Neb., MST.	KSTP	1460	St. Paul, Minn., CST.
KGMB	1320	Honolulu, Hawaii.	KTAB	560	San Francisco, Calif.
KONE	1430	North Diste Nol	KTAB Ktar	620	San Francisco, Calif. Phoenix, Ariz., MST. Ft. Worth, Texas.
KGNF		North Platte, Neo.	KTAN		THOULLY, ALLA, MALL
KGNF Kgno	1210	North Platte, Neb. Dodge City, Kans. San Francisco, Calif. Amarillo, Texas, CST.	KTAT	1240	Ft. Worth, Lexas.
KGO	790	San Francisco Calif	KTBS	1450	Shreveport, La., CST, Twin Falls, Idaho, MS
	1410	Amarilla Tama CST	KTFI	1240	Twin Falls Idaho MS
KGRS		Amarino, Texas, C.57	D-III	1040	Twin Fana, Idano, Mo
KGU	750	Honolulu Hawau	KTHS KTM	1040	Hot Springs, Ark., CST Los Angeles, Calif., PS Houston, Texas, CST.
KGVO	1200	Missoula, Mont., MST Portland, Ore., PST. Olympia, Wash., PST.	KTM	780	Los Angeles, Calif., PS
Kow		Death and One DOT	KTRH	1120	Houston Toxos CST
KGW	620	Portland, Ore., FSI.			nousion, rexas, Cor
KGY	1210	Olympia, Wash., PST.	KTSA	1290	
KHJ	900		KTSM	1310	El Paso Texas
		Spokane, Wash., PST. Clovis, N. M. Red Oak, Iowa Idaho Falis, Idaho MST. Paine Idaho MST.	N'TW	1220	El Paso. Texas. Seattle. Wash. Walla Walla, Wash. Yuma, Ariz, MST.
KHQ	590	Spokane, wash., PS1.	KTW		Beattle, wash.
KICA	1370	Clovis, N. M.	KUJ	1370	Walla Walla, Wash.
KICK	1420	Red Oak Jowa	KUMA	1420	Yuma, Ariz. MST.
KID	1320	List - Falls Liste MCT	KUOA	1390	Fayetteville, Ark., CS7 Vermillion, S. D., CS7
KID		Idano rans, Idano, 1931.			Fayericvine, Ark., OI
KIDO	1350	Boisc. Idaho, MST.	KUSD	890	verminion, S. D., CSI
KIDW	1420	Lamar Colo, MST.	KVI	570	Tacoma, Wash., PST.
KIEM	1210	Enals Culif DST	KVL	1370	Souttle Wash
NICM		Lamar, Colo., MST. Lamar, Colo., MST. Eureka, Calif., PST. Glendale, Calif., PST. Juneau, Alaska Valime Weeth, PST.			Tacoma, Wash., PST. Seattle, Wash., Tucson, Ariz. Tulsa, Okla., CST.
KIEV	850	Glendale, Calit., PST.	KVOA	1260	Lucson, Ariz.
KIFH	1310	Juneau Alaska	KVOO	1140	Tulsa, Okla., CST.
KIT	1310	Yakima, Wash., PST.	KVOR	1270	Colorado Springs, Colo
		Takima, wash, r.o.r.	NU00		D 12 1 - W
KJBS	1070	San Francisco, Calif.	KVOS	1200	Bellingham, Wash.
KJR	970	Seattle, Wash., PST.	KWCR	1420	Cedar Rapids, 1a., Co
KLCN	1290	Blytheville, Ark.	KWEA	1210	Shreveport La
		Divinevine, Atk.	KWG		Shreveport, La. Stockton, Calif., PST.
KLO	1400	Ogden, Utah.		1200	Stockton, Call., PST.
KLPM	1240	Minot. N. D., CST.	KMJJ	1060	Portland, Ore.
KLRA	1390	Little Rock Ark CST	KWK	1350	St Louis Mo CST
		DALLE LOCK, ALK., COL.	<b>KWKC</b>	1270	Vanag City Mc
KLS	1440	Uakland, Calit., PST.		1370	Kansas City, MO.
KLX	880	Blytheville, Ark. Ogden, Utah. Minot, N. D., CST. Little Rock, Ark., CST. Oakland, Calif., PST. Oakland, Calif., PST. Oakland, Calif., PST. Shenandoah, Iowa, CST. Shanandoah, Iowa, CST. Kansas City, Mo., CST. Medford, Ore., PST. Fresno, Calif., PST. Clay Center, Neb., CST. Tacoma, Wash., PST. St. Louis, Mo., CST. Beverly Hils, Calif. Hollywood, Calif., PST. Austin, Texas, CST. Hollywood, Calif., PST.	кwкн	850	Kansas City, Mo. Shreveport, La., CST. Decorah, Iowa, CST. Pullman, Wash., PST.
KI 7	560	Danuar Colo MST	KWLC	1270	Decorah Iowa CST
KLZ KMA		Deliver, Colo., MDT.	KWSC	1220	Dullman Wash DST
KMA.	930	Shenandoan, Iowa, CSI.			Fullman, wash., FOT
KMAC	1370	San Antonio, Tex., CST.	KWWG	1260	Brownsville, Texas. Seattle, Wash., PST. Portland, Ore., PST.
KMBC	950	Kangas City Mo CST	KXA KXL	760	Seattle, Wash., PST.
KMCD	1310	Malfard Ore DOT	K Y I	1420	Portland Ore PST
KMEU		Mediora, Ore., 181.	202		Tortianic, Ore., 1 51.
KMJ	580	Fresno, Calif., PST.	KXO	1500	El Centro, Cani.
KMED KMJ KMLB	1200	Monroe La. CST.	KXRO	1310	Aberdeen, Wash., PST
KMMJ	740	Clay Contar Neb CST	KXY7	1440	El Centro, Calif. Aberdeen, Wash., PST Houston, Texas, CST.
		Ciay Center, Neb., Cor.	KXRO KXYZ KYA KYW	1230	San Francisco, Calif. Chicago, Ill., CST. Manila, P. I.
кмо	1330	Tacoma, Wash., PST.	<b>NTA</b>	1230	San Francisco, Cam.
KMOX	1090	St. Louis, Mo., CST.	KYW	1020	Chicago, III., CST.
KMPC	710	Boverly Hills Calif	KZRM	618.5	Manila, P. I.
KMFU	670	Deveny mus, Cant.		690	Arlington Vo
KMTR	570	Hollywood, Call., PST.	NAA		Arlington, Va.
KNOW	1500	Austin, Texas, CST.	RUS	664	Salvador.
	1050	Hollywood, Calif., PST. Denver, Colo., MST.	TICR	911	San Jose, C. R. Glace Bay, N. S., AS' St. Johns, N. F.
KNX Koa		D = O = M O T	VAS	685	Close Bay N.S. 4S'
KUA	830	Denver, Colo., MST.			Glace Day, N. D., HOL
KOAC	550		VOAS	810	St. Johns, N. F.
ков	1180	Albuquerque, N. M.	VOGY	890	St. Johns, N. F.
KOCW	1400	Chickasha, Okla.	VOKW VONF	1300	St Johns N F
KUUW	1400	Unickasha, Okta.	VONE	1100	Ct Labor N F
KUH	1380	Reno, Nev., PST.	VUNF	1195	St. Johns, N. F.
KOH Koil	1260	Council Bluffs, Ia., CST.	VOWR	750	St. Johns, N. F. St. Johns, N. F. St. Johns, N. F. St. Johns, N. F. Briter, Mass. EST
KOIN	940	Council Bluffs, Ia., CST. Portland, Ore., PST. Seattle, Wash., PST. Oklahoma City, Okla	WAAB	1410	Boston, Mass., EST. Chicago, Ill., CST. Newark, N. J., EST. Jersey City, N. J., EST. Jornaha, Neb., CST.
		C thank, Ole., I OI.	WAAF	920	Chiengo III CST
KOL	1270	Seattle, wash., 151.			Vincago, In., COL
KOMA	1480	Oklahoma City, Okla.	WAAM	1250	Newark, N. J., EST.
KOMO	920 1370	Seattle Wash. PST.	WAAT	940	Jersev City, N. J., ES
KONO	1270	San Antonio Toy CST	WAAW	660	Omaha Neb CST
KONU	1310	San Antonio, Tex., CST.			Nam Vork City FST
KOOS	1370	Ma shfield, Ore., PST.	WABC	860	New TOPK City, 201
KORE	1420	Seattle, Wash., PST. Oklahoma City, Okla. Seattle, Wash., PST. San Antonio, Tex., CST. Marshfield, Ore., PST. Eugene, Ore., PST. Phonnix Ariz MST	WABI	1200	New York City, EST. Bangor, Maine, EST. Waco, Texas, CST. Akron Obio EST.
KOY	1390	Phoenix, Ariz., MST. Senttle, Wash., PST. Prescott, Ariz., MST.	WACO	1240 1320	Waco, Texas. CST.
KBOD	650	Souttle Week DCT	WADC	1320	Akron, Ohio, EST.
KPCB Kpjm	000	Deathie, Wash., FOI.			
KPJM	1500	Prescott, Ariz., MST.	WAGM	1420	Presque Isle, Me. ES
KPO	680	San Francisco, Calif.	WAIU	640	Columbus, Ohio, EST
KPOF	880	Donvor Colo MST	WALR	1210	Zanesville, Ohio, EST Anniston, Ala., CST. Laurel, Miss.
KBBA		Pasedena, Calif., PST. Wena chee, Wash., PST. Houston, Texas, CST.	WAMC	1420	Anniston Ala CST
KPPC	1210	rasedena, Gain., Por	WANG C	1010	Tanal Me-
KPQ KPRC	1500	Wena' chee, Wash., PST.	WAML	1310	Laurel, MISS.
KPRC	920	Houston Texas CST.	WAPI	1140	Birmingham, Ala., Ca
KOV	1380	Dittahungh Po UST	WASH	1270	Gd Banida Mich ES
KQV		Pittsburgh, Pa., EST.			Gundah M I FOT
KQW	1010	San Jose, Calif., PST.	WAWZ	1350	Zarephatu, N. J., ESI
KRE	1370	Pittsburgh, Pa., EST. San Jose, Calif., PST. Berkeley, Calif., PST. Santa Ana, Calif., PST. Harlingen, Texas, CST. Los Angeles, Calif., PST. Dallas, Texas, CST. Shrangapet Lowa, CST.	WAZL	1420	Birmingham, Ala., CS Gd. Rapids, Mich., ES Zarephath, N. J., EST Hazelton, Pa., EST. Lafayette, Ind., CST. Harrielourg Pa. EST
KREG	1500	Santa Ana Calif PST	WBAA	1400	Lafayette, Ind., CST.
		Uurlingen Torge COT	WBAK	1430	Harrisburg Pa EST
KRGV	1260	maringen, rexas, CST.		1000	Deltimone Mil 7007
KRKD	1120	Los Angeles, Calif., PST.	WBAL	1060	Harrisburg, Pa., EST. Baltimore, Md., EST Ft. Worth, Texas, CST Willow Porte, Texas, CST
KRLD	1040	Dallas, Texas, CST.	WBAP	800	Ft. Worth, Texas, CS7
	1210	Shreveport, Iowa, CST. Oakland, Calif., PST. Seattle, Wash., PST.	WBAX	1210	Wilkes Barre, Pa., ES Brooklyn, N. Y., EST Richmond, Va., EST. Chicago, Ill., CST. Brooklyn, N. Y., EST
KRMD	1310	Sureveport, Iowa, Col.	WORA	1400	Development V FOR
KROW Krsc	930	Oakland, Calif., PST.	WBBC	1400	Brooklyn, N. 1., EST
KRSC	1120	Seattle, Wash., PST.	WBBL	1210	Richmond, Va., EST.
KSAC	580	Manhattan Kone CST	WBBM	770	Chicago, Ill CST
	000	a analia an, hans. Cor.	WOOD		Brooklyn N V FOT
KSCJ	1330	SIGUX CITY, IOWA, CST.	WBBR	1300	DIOOKIYII, N. 1 . LOI
KSD	550	St. Louis, Mo., CST.	WBBX	1200	New Orleans, La., CS
KSD KSEI	890	Manhattan, Kans., CST. Sioux City, Iowa, CST. St. Louis, Mo., CST. Pocatello, Idaho, MST. Sak Loke City, Utab	WBBZ	1200	Ponca City, Okla., CA
KOLI	1130	Solt Lake Citer The	WBCM	1410	Bay City Mich EST
KSL		Sall Lake Only, Otal	WDCH	000	Duffele X V ECT
KSO	1370	Des Moines, lowa.	WBEN	900	Dunalo, N. L. LoI
KSOO	1110	Sioux Falls, S. D., CST.	WBEO	1310	New Orleans, La., CS Ponca City, Okla., CS Bay City, Mich EST Buffalo, N. Y., EST Marquette, Mich CS
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TAB TAR TAR TBS TFI		
	560	St. Paul, Minn., CST. San Francisco, Calif. Phoenix, Ariz., MST. Ft. Worth, Texas. Shreveport, La., CST. Twin Falls, Idaho, MST. Hot Springs, Ark., CST. Los Angeles, Calif., PST. Houston, Texas, CST. Ban Antonio, Tex., CST. El Paso, Texas. Seattle, Wash. Walla, Wash. Yuma, Ariz., MST. Fayettieville, Ark., CST.
TAR .	620	Phoenix, Ariz., MST.
TAT	1240	Ft Worth Texas
Re	1450	Shreveport La CST
103	1240	Twin Falls Idaho MST
	1240	I win Falls, Idano, Mor.
HS	1040	110t Springs, Ark., USI
M	780	Los Angeles, Calif., PST.
r R H	1120	Houston, Texas, CST.
r sa	1290	San Antonio, Tex., CST.
<b>ISM</b>	1310 1220 1370	El Paso Texas.
ſŴ	1220	Sonttle Wash
11	1970	Walls Walls Wach
10	1400	Walla Walla, Wash.
JMA	1420	Yuma, Ariz., Mol.
JOA	1390	Fayetteville, Ark., CST. Vermillion, S. D., CST. Tacoma, Wash., PST. Seattle, Wash.
JSD	890	Vermillion, S. D., CST.
/1	570	Tacoma, Wash., PST.
/L	1370	Seattle, Wash. Tueson, Ariz. Tulsa, Okla., CST. Colorado Springs, Colo. Bellingham, Wash. Cedar Rapids, I.a., CST.
/04	1260	Tueson Ariz
/0A /00	1140	Tules Okla CST
OR	1270	Calanda Springer Colo
		D III I I I I I I I I I I I I I I I I I
102	1200	Bellingham, wash.
WCR	1420	Cedar Rapids, Ia., CST.
WEA	1210	Shreveport, La.
WG	1200	Stockton, Calif., PST.
WJJ	1060	Portland, Ore.
VOS WCR WEA WG WJJ WK WKC	1350	St Louis Mo CST
WKC	1370	Kansag City Mo
	850	Chronoport Lo COT
WI C		Direveport, 1A.,COL.
WKH WLC WSC	1270	Decoran, Iowa, CST.
WSC	1220	Pullman, Wash., PST.
WWG	1260	Brownsville, Texas.
X A	760	Cedar Rapids, Ia., CST. Shreveport, I.a. Stockton, Calif., PST. Portland, Ore. St. Louis, Mo., CST. Kansas City, Mo. Shreveport, I.a., CST. Decorah, Jowa, CST. Pullman, Wash., PST. Brownsville, Texas. Seattle, Wash., PST. Portland, Ore., PST. El Centro, Calif. Aberdeen, Wash., PST. Houston, Texas, CST. San Francisco, Calif. Chicago, Ill., CST. Manila, P. I. Arlington, Va. Salvador, D.
X L	1420	Portland, Ore., PST.
xo	1500	El Centro, Calif.
X RO	1310	Aberdeen Wash PST
¥ ¥ 7	1440	Houston Toxue CST
XRO XYZ YA YW	1440 1230	San Francisco Colif
	1230	San Francisco, Cam.
W	1020	Unicago, In., USI
2 K M	618.5	Manila, P. I.
4A	690	Arlington, Va.
JS	664	Salvador.
CR	911	San Jose, C. R.
AS DAS	685	Glace Bay, N. S., AST.
DAS	810	St. Johns, N. F.
	890	St. Johns N F
ίκ	1300	St Johns N F
		Ct Islam N E
	1195	DL. JUIIIS, N. F.
JWK		St. Johns, N. F.
AAB	750 1410	Doston, mass., 1531.
AAB AAF	920	Chicago, Ill., CST.
DKW DNF DWR AAB AAF AAM	920 1250	Chicago, Ill., CST. Newark, N. J., EST.
	920 1250	Chicago, Ill., CST. Newark, N. J., EST. Jersey City, N. J., EST.
	920	Chicago, Ill., CST. Newark, N. J., EST. Jersey City, N. J., EST. Omaha, Neb., CST.
AAM AAT AAW	920 1250 940 660	Chicago, Ill., CST. Newark, N. J., EST. Jersey City, N. J., EST. Omaha, Neb., CST. New York City. EST.
AAM AAT AAW	920 1250 940 660 860	Chicago, III, CST. Newark, N. J., EST. Jersey City, N. J., EST. Omaha, Neb., CST. New York City, EST. Bangor Maine EST
AAM AAT AAW	920 1250 940 660 860 1200	Dosion, Mass., 1937. Chicago, III., CST. Newark, N. J., EST. Jersey City, N. J., EST. Omaha, Neb., CST. New York City, EST. Bangor, Maine, EST. Waon Teras CST
AAM AAT ABC ABI ACO	920 1250 940 660 860 1200 1240	Doston, Mass., 2517. Chicago, IL, CST. Newark, N. J., EST. Jersey City, N. J., EST. Omaha, Neb., CST. New York City, EST. Bangor, Maine, EST. Waco, Texas, CST. Jerso Chin, PST.
AAM AAT Abc Abc Abi Aco Adc	920 1250 940 660 860 1200 1240 1320	Doston, Mass., 1937. Chicago, III., CST. Newark, N. J., EST. Jersey City, N. J., EST. Omaha, Neb., CST. New York City, EST. Bangor, Maine, EST. Akron, Ohio, EST. Durson, Ela, M. EST.
AAM AAT ABC ABC ABI ACO ADC AGM	920 1250 940 660 860 1200 1240 1320 1420	Dosion, Mass., 2517. Chicago, III., CST. Newark, N. J., EST. Jersey City, N. J., EST. Omaln, Neb., CST. New York City, EST. Bangor, Maine, EST. Waco, Texas, CST. Akron, Ohio, EST. Presque Isle, Me., EST.
AAM AAT ABC ABC ABI ACO ADC AGM	920 1250 940 660 860 1200 1240 1320 1420 640	Salvador. Salvador. Salvador. Glace Bay, N. S., AST. St. Johns, N. F. St. Johns, N. F. St. Johns, N. F. St. Johns, N. F. Boston, Mass., EST. Chicago, III., CST. Newark, N. J., EST. Jersey City, N. J., EST. Newark, N. J., EST. New York City, EST. New York City, EST. Bangor, Maine, EST. Naco, Texas, CST. Akron, Ohio, EST. Presque Isle, Me., EST. Columbus, Ohio, EST.
AAM AAT ABC ABC ABI ACO ADC AGM	920 1250 940 660 860 1200 1240 1320 1420 640 1210	Doston, Mass., 237. Chicago, II., CST. Newark, N. J., EST. Jersey City, N. J., EST. Omaha, Neb., CST. New York City, EST. Bangor, Maine, EST. Waco, Texas, CST. Akron, Ohio, EST. Presque Isle, Me., EST. Zanesville, Ohio, EST.
AAM AAT ABC ABI ACO ADC AGM AIU ALR AMC	920 1250 940 660 860 1200 1240 1320 1420 640 1210 1420	Zanesville, Ohio, EST.
AAM AAT ABC ABI ACO ADC ADC ADC ALR AMC AML	920 1250 940 660 860 1200 1240 1320 1420 640 1210 1420	Zanesville, Ohio, EST.
AAM AAT ABC ABI ACO ADC ADC ADC ALR AMC AML	920 1250 940 660 1200 1240 1320 1420 640 1210 1420 1410 1420 1310	Zanesville, Ohio, EST.
AAM AAT AAW ABC ABI ACO ADC Adc Adc Adc Adc Adc Adc Adc Adc Adc Adc	920 1250 940 660 1200 1240 1320 1420 640 1210 1420 1310 1140	Zanesville, Ohio, EST.
AAM AAT AAW ABC ABI ACO ADC AGM AIU ALR AMC AML API ASH	920 1250 940 660 860 1200 1420 1420 1420 1420 1420 1310 1140 1270	Zanesville, Ohio, EST.
AAM AAT AAW ABC ABI ACO ADC ACO ACO ALR ALR AMC AML AML AWZ	920 1250 940 660 860 1200 1420 1420 1420 1420 1310 1140 1270 1350	Zanesville, Ohio, EST.
AAM AAT AAW ABC ABC ACC ACC ACC ACC ACC ACC ACC ACC	920 1250 940 660 1200 1240 1420 1420 1420 1420 1420 1310 1420 1310 1420 1350 1420	Zanesville, Ohio, EST.
AAM AAT ABC ABI ACO ADC ACO ADC ACO ADC ACO ADC ACO ADC ACO ACO ACO ACO ACO ACO ACO ACO ACO AC	920 940 960 860 1200 1240 1420 1420 1420 1210 1420 1310 1440 1350 1420 1420	Zanesville, Ohio, EST.
AAM AAT ABC ABC ACO ACO ACO ACO ACO ACO ACO ACO ACO AC	920 940 660 860 1200 1240 1240 1420 1210 1420 1210 1420 1310 1420 1420 1440 1430	Zanesville, Ohio, EST.
AAM AAT AABC ABI ACO ADC ADC ADC ADC ALR AMC AML ASH ASH ASH ASH ASH ASH ASH ASH ASH ASA ASL ASA ASL ASA ASL ASSA ASSA	920 1250 660 860 1200 1320 1420 1420 1420 1420 1310 1420 1350 1140 1270 1350 1420 1430 1430 1430	Zanesville, Ohio, EST.
AAM AAT AABC ABI ACO ADC ADC ADC ADC ADC ADC ADC ADC ADC ADC	920 940 660 860 1200 1240 1320 1420 1210 1420 1310 1420 1310 1420 1420 1440 1430	Zanesville, Ohio, EST.
AAM AAT AABC ABI ACO ADC ADC ADC ADC ADC ADC ADC ADC ADC ADC	920 1250 660 1200 1200 1420 1420 1420 1420 1420 142	Zanesville, Ohio, EST.
AAM AABC ABC ABC ABC ABC ABC ABC ABC ABC AB	920 1250 940 660 1200 1240 1320 1420 640 1210 1420 1310 1420 1420 1420 1420 1420 1420 1420 14	Zanesville, Ohio, EST.
AAM AABC ABC ACC ACC ACC ACC ACC ACC ACC AC	920 1250 660 860 1240 1240 1420 1420 1420 1420 1310 1420 1350 1420 1430 1430 1430 1430 1400	Zanesville, Ohio, EST.
AAM AAAW ABC ABC ACC ACC ACC ACC ACC ACC ACC ACC	920 1250 660 860 1240 1240 1420 1420 1420 1420 1310 1420 1350 1420 1430 1430 1430 1430 1400	Zanesville, Ohio, EST.
AAAT AAAC AABC AABC AABC AABC AABC AABC	920 1250 660 860 1200 1420 1420 1420 1420 1420 1420 142	Zanesville, Ohio, EST.
AAM AAAW AABC AABC AABC AABC AABC AABC AABC	920 1250 940 660 1200 1240 1240 1320 1420 1210 1420 1310 1310 1420 1420 1420 1430 1420 1430 1420 1430 1210 1400 1210 1210 1210 1210 1210 121	Zanesville, Ohio, EST.
AAMT AABC AABC AABC AACCC AAGC AAGC AAGC AAG	920 1250 940 660 1200 1200 1200 1200 1200 1200 1200	Zanesville, Ohio, EST.
AAAT AAABC AAABC AAAGU AAAAGU AAAAAAGU AAAAGU AAAAGU AAAAGU AAAAGU AAAAAAAA	920 940 940 940 940 1200 1200 1240 1320 640 1320 640 1320 1420 1310 1310 1340 1420 1400 1210 1400 1210 1400 1210 1400 1210 1200 1200 1320 1400 1320 1400 1320 1400 1200 1320 1400 1400 1200 1400 1200 1400 1200 1400 1400 1400 1200 1400 1210 1400 1210 1400 1210 1400 1210 1200 1200 1200 1200 1400 1200 1200 1200 1400 1200 1	Zanesville, Ohio, EST.
AAAT AAABC AAABC AAAGU AAAAGU AAAAAAGU AAAAGU AAAAGU AAAAGU AAAAGU AAAAAAAA	920 940 940 940 940 1200 1200 1240 1320 640 1320 640 1320 1420 1310 1310 1340 1420 1400 1210 1400 1210 1400 1210 1400 1210 1200 1200 1320 1400 1320 1400 1320 1400 1200 1320 1400 1400 1200 1400 1200 1400 1200 1400 1400 1400 1200 1400 1210 1400 1210 1400 1210 1400 1210 1200 1200 1200 1200 1400 1200 1200 1200 1400 1200 1	Zanesville, Ohio, EST.
AAAT AAAC AABC AADC AADC AADC AADC AADC AADC	920 1250 940 660 1200 1200 1200 1200 1200 1200 1200 1200 1200 1420 140	Zanesville, Ohio, EST.
AAMT AABC AABC AABC AACCC AAGC AAGC AAGC AAG	920 940 940 940 940 1200 1200 1240 1320 640 1320 640 1320 1420 1310 1310 1340 1420 1400 1210 1400 1210 1400 1210 1400 1210 1200 1200 1320 1400 1320 1400 1320 1400 1200 1320 1400 1400 1200 1400 1200 1400 1200 1400 1400 1400 1200 1400 1210 1400 1210 1400 1210 1400 1210 1200 1200 1200 1200 1400 1200 1200 1200 1400 1200 1	<ul> <li>Boston, Mass., 237.</li> <li>Chicago, 11., CST.</li> <li>Newark, N. J., EST.</li> <li>Omaha, Neb., CST.</li> <li>Omaha, Neb., CST.</li> <li>Mawyork City, EST.</li> <li>Bangor, Maine, EST.</li> <li>Waco, Texas, CST.</li> <li>Akron, Ohio, EST.</li> <li>Presque Isle, Me., EST.</li> <li>Columbus, Ohio, EST.</li> <li>Zanesville, Ohio, EST.</li> <li>Laurel, Miss.</li> <li>Birmingham, Ala., CST.</li> <li>Idagetta, Mich., EST.</li> <li>Gd. Rapids, Mich., EST.</li> <li>Hazelton, Pa., EST.</li> <li>Hazelton, Pa., EST.</li> <li>Hazelton, Pa., EST.</li> <li>Hazelton, Pa., EST.</li> <li>Baltimore, Md., EST.</li> <li>Ft. Worth, Texas, CST.</li> <li>Biroklyn, N. Y., EST.</li> <li>Richmond, Va., EST.</li> <li>Brooklyn, N. Y., EST.</li> <li>Pooklyn, N. Y., EST.</li> <li>Pooklyn, N. Y., EST.</li> <li>Pooklyn, N. Y., EST.</li> <li>Pooklyn, N. Y., EST.</li> <li>Buffalor, N.Y., EST.</li> <li>Buffalo, N.Y., EST.</li> <li>Marquette, Mich., CST.</li> </ul>

WELLC	1000	Husteville Ale COT
WBHS WBIG	1200 1440	Huntsville, Ala., CST. Greensboro, N. C., EST. New York City, EST. New York City, Terre Haute, Ind., CST. Birmingham, Ala., CST. Wilkes Barre, Pa. Babson Park, Mass. Charlotte, N. C., EST. Danville, Va., EST. Boston, Mass., EST. Soringfield, Mass., EST.
WBNX	1350	New York City, EST.
WBOQ	860	New York City.
WBOW WBRC	1310 930	Birmingham Ala. CST.
WRRF	1310 920	Wilkes Barre, Pa.
WBSO	920 1080	Babson Park, Mass.
WBSO WBT WBTM	1370	Danville, Va., EST
WBZ	990	Boston, Mass., EST.
WBZA	990 600	Springfield, Mass., EST, Storrs Conn. EST
WCAC WCAD	1220	Boston, Mass., EST. Springfield, Mass., EST. Canton, N. Y., EST. Pittsburgh, Pa., EST. Columbus, Ohio, EST. Lineoln, Neb., CST. Northfield, Minn., CST. Baltimore, Md., EST. Rapid City, S. D., CST. Burlington, Vt., EST. Carthage, Ill., CST. Allentown, Pa., EST.
WCAE	1220 1430	Pittsburgh, Pa., EST.
WCAJ	590	Lincoln, Neb., CST.
WCAH WCAJ WCAL WCAM	1250	Northfield, Minn., CST.
WCAN	1280 600	Camden, N. J., EST. Baltimore Md EST
WCAO WCAP WCAT	1280	Asbury Park, N. J., EST
WCAT	1200	Rapid City, S. D., CST.
WCAU	1170 1200	Burlington, Vt., EST.
WCAU WCAX WCAZ WCBA	1070	Carthage, Ill., CST.
WCBA	1440 1080	Allentown, Pa., EST.
WCBD WCBM	1370	Baltimore, Md., EST.
WCBS	1210	Springfield, Ill., CST.
WCBS WCCO WCDA	810 1350	New York City, EST.
WCFL WCGU WCKY WCLO	970	Carthage, Ill., CST. Allentown. Pa., EST. Zion, Ill., (ST. Baltimore, Md., EST. Springfield, Ill., CST. Minneapolis, Minn. New York City, EST. Chicago, Ill., CST. Brooklyn, N. Y., EST. Govington, Ky., CST. Janesville, Wis, CST. Joliet, Ill., CST. Pensacola, Fla., CST.
WCGU	1400 1490	Brooklyn, N. Y., EST.
WCLO	1200	Janesville, Wis. CST.
WCLS WCOA	1310 1340	Janesvine, vis., CST. Pensacola, Fla., CST. Meridian, Miss., CST. Harrisburg, Pa., EST. Charleston, S. C., EST. Otarleston, S. C., EST. Tampa, Fla., EST. Kansas City, Mo., CST. Amarillo, Texas. Philadelphia, Pa., EST. Bl Paso, Texas. Philadelphia, Pa., EST. Ranoke, Va., EST. Orlando, Fla., EST.
WCOC	880	Meridian, Miss. CST.
WCOC WCOD WCRW WCSC WCSH	1200	Harrisburg, Pa., EST.
WCRW	1210 1360	Chicago, III., CST. Charleston S. C. EST
WCSH	940	Portland, Maine EST.
WDAE WDAF	1220 610	Tampa, Fla., EST. Kunsas City Mo. CST
WDAG	1410	Amarillo, Texas, CST.
WDAH	1310 1370	El Paso, Texas.
W DAS W DAY	940	Fargo, N. D., CST.
WDBJ	930	Roanoke, Va., EST.
WDBO WDEL	580 1120	Wilmington Del. EST.
WDEV WDGY	550	Fargo, N. D., CST. Roanoke, Va., EST. Orlando, Fla., EST. Wilnington, Del., EST. Waterbury, Vt., EST. Minnequolis, Minn. Chattanooga, Tenn. Hartford, Conn., EST. New Orleans, La., CST.
WDGY WDOD	1180 1280	· Minneapolis, Minn.
WDRC	1330	Hartford, Conn., EST.
WDSU	1250	New Orleans, La., CST.
WDZ WEAF	1070 660	Hartford, Conn., EST. New Orlenns, La., CST. Tuscola, Ill., CST. New York City, EST. Providence, R. I., EST. Columbus, Obio, EST. Harrisburg, Ill., CST. Buiffalo, N.Y., EST. Chicago, Ill. Parton Mage, EST.
WEAN WEAO	780	Providence, R. I., EST,
WEAO	570 1290	Columbus, Ohio, EST. Superior Wis CST
WEBQ	1210	Harrisburg, Ill., CST.
WEBC WEBQ WEBR WEDC WEEI	1310 1210	Buffalo, N. Y. EST.
WEEI	590	Boston, Mass., EST.
WEEU WEHC WEHS WELL	830	Reading, Pa., EST.
WEHC	1350 1420	Emory, Va., EST. Cicero III CST
WELL	1420	Battle Creek, Mich.
WEND	1420 870	Americus, Ga., EST.
WERE	1420	Erie, Pa., EST.
WELL WENC WENR WESG WEVD WEW WEXL WFAA WFAA	1040	Barthabone, Y. 1957 Chicago, Ill. Boston, Mass., EST. Reading, P.a., EST. Cicero, Ill., CST. Battle Creek, Mich. Americus, Ga., EST. Chicago, Ill., CST. Erie, P.a., EST. Elmira, N. Y. New York City, EST. St. Louis, Mo., CST. New York City, EST. New York City, EST. South Bend, Ind., CST. White Plains, N. Y. Gruenville, S.C.
WEVD	1300 760	St. Louis, Mo. CST.
WEXL	1310	Royal Oak, Mich., EST
WFAA	800 1300	Dallas, Texas, CST. New York City EST
WFAM	1200	South Bend, Ind., CST.
WFAS WFBC	1210	White Plains, N. Y. Greenville.S.C.
WIBC	1200	Greenvine, ö. U.

## INDEX BY CALL LETTERS

WFBE	1200	Cincinnati, Ohio, EST.	WJBK	1370	Detroit, Mich., EST.	WNBZ	1290	Saranac Lake, N. Y.
WFBG	1310	Altoona, Pa.		1200	Decatur, Ill., CST	WNOX	560	Knoxville, Tenn., CST.
WFBL	1360	Syracuse, N. Y., EST.		1420	New Orleans, La.	WNYC	570	New York City, PCT
		byracuse, N. 1., DOI.					510	New York City, EST. San Antonio. Tex., CST.
WFBM		Indianapolis, Ind., CST.		1210	Lewisburg, Pa., EST.	WOAI	1190	San Antonio, Tex., CST.
WFBR	1270	Baltimore, Md., EST.	WJBW	1200	New Orleans, La., CST.	WOBU	580	Charleston, W.Va., EST.
WFDF	1310	Flint, Mich., EST.	WJBY	1210	Gadsden, Ala., CST.	WOC	1000	Davenport, Iowa, CST.
WFDV	1500	Rome, Ga., CST.	WJDX	1270	Jackson, Miss., CST.	WOCL	1210	Ismesterin N. V. ECT.
WFEA		Manahasta N H ECT			Jackson, Miss., C.51.			Jamestown, N. Y., EST.
	1430	Manchester, N. H., EST.	WJEJ	1210	Hagerstown, Md.	WODA	1250	Paterson, N. J.
WFI	560	Philadelphia, Pa., EST.	WJEQ	1370	Williamsport, Pa.	WODX	1410	Mobile, Ala., CST. Ames, Iowa, CST.
WFIW	940	Hopkinsville, Ky., CST. Clearwater, Fla., EST.	WJJD	1130	Chicago, Ill., CST. Gary, Ind., CST.	WOI	640	Ames. Iowa, CST.
WFLA	620	Clearwater Fla EST	WJKS	1360	Gary Ind CST	WOKO	1430	Albany, N. Y., EST.
WFOX	1400	Brooklyn, N. Y., EST.		1420	Ironwood, Mich., CST.	WOL	1310	Washington, D. C., EST.
WGAL	1310	Lenseter D. ECT		770	Detail Mail ROM			Washington, D. C., EST.
		Lancaster, Pa., EST.	WJR	750	Detroit, Mich., EST. Washington, D. C., EST. Atlanta, Ga., CST. Akron, Ohio, EST.	WOMT	1210	Manitowoc, Wis., CST Gd. Rapids, Mich., EST.
WGAR	1450	Cleveland, Ohio, EST. Freeport, N. Y., EST. Evansville, Ind., CST.		1460	Washington, D. C., EST.	WOOD		Gd. Rapids, Mich., EST.
WGBB	1210	Freeport, N. Y., EST.	WJTL '	1370	Atlanta, Ga., CST.	WOPI	1500	Bristol, Tenn., EST. Kansas City, Mo., CST. Newark, N. J., EST.
WGBF	630	Evansville Ind. CST.	WJW	1210	Akron Ohio EST	WOQ	1300	Kunna City Mo CST
WGBI	880	Scranton, Pa., EST.	WJZ	760	New York City FST	WOR	710	Namale N L FOT
WGCM		Cultant Man OOT	WKAO	1240	New York City, EST.		1000	Newark, N. J., LOI.
		Gulfport, Miss. CST.			San Juan, P. R., AST.	WORC	1200	worcester, wass, LST.
WGCP	1250	Newark, N. J., EST.	WKAR	1040	E. Lansing, Mich., EST.	WORK		York, Pa., EST.
WGES	1360	Newark, N. J., EST. Chicago, Ill., CST.	WKAR WKAV	1310	Laconia, N. H., EST.	wos	630	York, Pa., EST. Jefferson City, Mo.
WGH	1310	Newport News, Va.	WKBB	1310	E. Lansing, Mich., EST. Laconia, N. H., EST. Joliet, Ill., CST.	wow	1130	New York City, EST.
WGL	1370	Fort Wayne Ind CST		1310	Birmingham, Ala.	wow	590	Omaha, Neb., CST.
WGLC	1370	Hudsen Falls N V ECT	WKDE	1400		wowo	1100	East Warrand L COM
WON		Fort Wayne, Ind., CST. Hudson Falls, N.Y., EST			Indianapolis, Ind., CST.	wowo	1160	Fort Wayne, Ind., CST.
WGN	720	Unicago, III., CST.	WKBH	1380	Laurosse, Wis., CST.	WPAD	1420	Paducah, Ky., CST.
WGNY	1210	Chester, N. Y., EST.		1420	LaCrosse, Wis., CST. Cicero, 111., CST.	WPAP	1010	Paducah, Ky., CST. New York City, EST.
WGR	550	Chicago, Ill., CST. Chester, N. Y., EST. Buffalo, N. Y., EST. Atlanta, Ga., CST. Sabaneatrdu, N.Y. EST.	WKBN	570	Youngstown, Ohio, EST.	WPAW	1210	Providence, R. I., EST.
WGST	890	Atlanta Ga CST	WKBV	1500	Connersville Ind CST	WPCC	560	Chicago III
WGY	790	Sabanactady NV FST	WKBW	1480	Connersville, Ind., CST. Buffalo, N. Y., EST. Ludington, Mich., CST.	WPCH	810	Chicago. Ill. New York City. EST.
	940	Schenectady, N.Y., EST. Madison, Wis., CST.	WK67		Lunalo, N. L., EOL.			new TORK City EST.
WHA		Madison, Wis., CST.		1500	Ludington, Mich., CST.	WPEN	1500	Philadelphia, Pa., EST.
WHAD	1120	Milwaukee, Wis., CST.	WKEU	1500	LaGrange, Ga.	WPFB	1370	Hattiesburg, Miss., CST.
WHAM	1150	Rochester N. Y EST.	WKFI	1210	Greenville Miss CST	WPG	1100	Atlantic City, N.J. EST
WHAS	820	Louisville Ky CST	WKJC WKRC	1200	Lancaster Pa EST	WPHR	1200	Atlantic City, N.J., EST. Petersburg, Va., EST.
WHAT	1310	Philadelphia Pa FST	WKPC	550	Cincinneti Obio FST	WPOR	780	Norfell, Va
WUAT	1300	r maderphia, ra., Eo1.		000	Cincillati, Onio, EST.	WPON	100	Norfolk, Va.
WHAZ		Louisville, Ky., CST. Philadelphia, Pa., EST. Troy, N. Y., EST. Kansas City, Mo., CST.	WKY	900	Lancaster, Pa., EST. Cincinnati, Ohio, EST. Oklahoma City, Okla.	WPRO	1210	Providence, R. I., EST.
WHB	860	Kansas City, Mo., CST.	WKZO	590	Nalamazoo, Mich., EST.	WPTF	680	Raleigh, N. C., EST. Miami, Fla., EST.
WHBC	1200	Canton, Unio, EST.	WLAC 1	1470	Nashville, Tenn., CST.	WQAM	560	Miami, Fla., EST.
WHBD	1370	Mt. Orab, Ohio, EST.	WLAP 1	1200	Louisville, Ky., CST.	WQAN	880	Scranton, Pa., EST.
WHBF	1210	Dool Island III COT	WLB 1	1250	Minneapolis, Minn., CST.	WQAD	1010	Now York City, PST
WHBL	1410	Moter Island, In., CST. Sheboygan, Wis., CST. Memphis, Tenn., CST.	WLBC	1310		WORD		New York City, EST.
		Sneboygan, wis., CST.			Muncie, Ind., CST.	WQBC	1360	Vicksburg, Miss., CST.
WHBQ	1370	Memphis, Tenn., CST.	WLBF 1	1420	Kansas City, Kans. CST.	WQDM	1370	St. Albans, Vt., EST.
WHBU	1210		WLBL	900	Stevens Point, Wis. CST.	WQDX	1210	Thomasville, Ga.
WHBY	1200	Green Bay, Wis., CST. Calumet, Mich., CST.	WLBW 1	1260	Erie, Pa., EST. Bangor, Maine, EST.	WRAK	1370	Williamsport, Pa., EST. Wilmington, N. C., EST. Reading, Pa., EST.
WHDF	1370	Calumet Mich CST	WLBZ	620	Bungor Maine EST	WRAM	1370	Wilmington N (' FST
WHDH	830	Boston Mosa FST		1340	Portland Ma EST	WRAW	1310	Deading Un DOT
		Boston, Mass., EST.			Portland, Me., EST.			Reading, Pa., EST
WHDL	1420	Tupper Lake, N.Y., EST.		1370	Lexington, Mass., EST.	WRAX	1020	Philadelphia, Pa , EST.
WHEB	740	Portsmouth, N. H. EST. Rochester, N. Y., EST.	WLIT	560	Philadelphia, Pa., EST. Boston, Mass., EST.	WRBL	1200	Columbus, Ga., CST Roanoke, Va., EST Washington, D. C., EST
WHEC	1430	Rochester, N. Y., EST.	WLOE 1	1500	Boston, Mass., EST.	WRBX	1410	Roanoke, Va., EST.
WHEF	1500	Kosciusko, Miss	WLS	870	Chicago, Ill., CST.	WRC	950	Washington D.C. EST
WHET	1210	Troy, Ala., CST.		1400	Brooklyn, N. Y. EST.	WRDO	1370	Augusta, Maine, EST.
WHFC	1420	Cierro III CYT		370	Lunchhung Vo DST	WRDW	1500	Augusta, Maine, 1931.
WHIS	1410	Direction III., COL.			Controlling, va., EST.			Augusta, Ga., EST.
WHIS	1410	Blueheld, W. Va., EST.	WLW	700	Cincinnati, Ohio, EST.	WREC	600	Memphis, Tenn.
WHK	1390	Cicero, Ill., CST. Bluefield, W. Va., EST. Cleveland, Ohio, EST.		1100	Lynchburg, Va., EST. Cincinnati, Ohio, EST. New York City., EST.	WREN	1220	Memphis, Tenn. Lawrence, Kans., CST. Minneapolis, Minn., CST.
WHN	1010	New York City, EST.	WMAC	570	Syracuse, N. Y.	WRHM	1250	Minneapolis, Minn. CST
<b>WHO</b>	1000	New York City, EST. Des Moines, Iowa. Jersey City, N. J., EST. Harrisburg, Pa., EST. Ottumwa, Iowa, CST. Madison, Wis., CST. Glenside, Pa., EST. Glenside, Pa., EST. Chicago, I.I., CST. Poynette Wis., CST.	WAML	630	Washington D.C. EST	WRJN	1370	Racine, Wis., CST.
WHOM	1450	Jersey City N J EST	WMAQ	670	Chicago III CST	WRNY	1010	New York City.
WHP	1430	Hamighung Do FOT	WMAS 1	1420	Springfold More EST			Karanilla The City.
WILL	1940	Otherson I.a. COM	WING A T	1100	Chicago, Ill., CST. Springfield, Mass., EST.	WROL	1310	Knoxville, Tenn., CST.
WIAS	1310	Ottomwa, 10wa, CST.		1180	Maeon, Ga., EST.	WRR	1200	Dallas, Texas, CST.
WIBA	1280	Madison, Wis., CST.		1420	Detroit, Mich., EST.	WRUF	830	Gamesville, Fla., EST.
WIBG	930	Glenside, Pa., EST.		1440	Peoria, Ill., CST.	WRVA	1110	Gainesville, Fla., EST. Richmond, Va., EST.
WIBM	1370	Jackson, Mich., EST.		1210	Richmond, Va. EST.	WSAL	1330	Cincinnati, Ohio, EST
WIBO	560	Chicago I'L CST	WMBH		Peoria, Ill., CST. Richmond, Va., EST. Joplin, Mo., CST.	WSAJ	1310	Grove (Sty Pa
WIBU	1210	Poynette Wis., CST.	WMBI 1	080	Chicago III CST	WSAN	1440	Grove City, Pa. Allentown, Pa., EST.
WIBW	580				Chicago. Ill., CST.			E H D: K. K. DOL.
WIDW		Topeka, Kans., CST.	WMB0 1	1310	Auburn, N. Y., EST. Brooklyn, N. Y., EST. Tampa, Fla., EST.	WSAR	1450	Fall River, Mass., EST.
WIBX	1200	Utica, N. Y.	WMBQ 1	1500	Brooklyn, N. Y., EST.	WSAZ	1190	Huntington, W. Va., EST.
WICC	600	Bridgeport, Conn., EST. St. Louis, Mo., CST.	WMBR 1	1370	Tampa, Fla., EST.	W SB	740	Atlanta, Ga., CST. Chicago, Ill., CST. South Bend, Ind., CST.
WIL	1200	St. Louis. Mo., CST.	WMC	780	Memphis, Tenn. CST.	WSBC	1210	Chicago III CST.
WILL	899	Urbana, Ill., CST.	WMCA	570	New York City EST	WSBT	1230	South Band Lud CST
WILM	1420	Wilmington Dol EST		1500	New York City, EST. Brooklyn, N. Y., EST. Fairmont, W. Va., EST.			Columbua OL: FOR
WILLING		Wilmington, Del., EST.	WMIL 1		Drookiyii, N. I., EST.	WSEN	1210	Columbus, Ohio, EST.
WINS	1180	New York City, EST.	WMMN	890	Fairmont, W. Va., EST.	WSFA	1410 1210	Montgomery, Ala., CST.
WIOD	1300	Miami, Fla., EST.		1500	Lapeer, Mich., EST.	WSIX		Montgomery, Ala., CST. Springfield, Tenn., CST. Winston-Salem, N. C.,
WIP	610	Philadelphia, Pa., EST.	WMSG 1	1350	New York City, EST.	WSJS	1310	Winston-Salem, N. C.
WIS	1010	Columbia, S. C., EST.	WMT	600	Waterloo, Iowa, CST.			EST.
WISN	1120	Milwaukao Wis CST		1230	Boston Mass FST	WSM	650	
WIAC		Milwaukee, Wis., CST. Johnstown, Pa., EST.			Boston, Mass., EST.			Nashville, Tenn., CST.
WJAC	1310	Johnstown, Pa., EST.	WNAD 1	1010	Norman, Ukla., EST.	WSMB	1320	New Orleans, La., CST.
WJAG	1060	Norfolk, Neb., CST.	WNAX	570	Norman, Okla., EST. Yankton, S. D., CST. Binghamton, N.Y.,EST.	WSMK	1380	New Orleans, La., CST. Dayton, Ohio, EST.
WJAR	890	Providence, R. L. EST.	WNBF 1	1500	Binghamton, N.Y. EST.	wsoc	1210	Gastonia, N. C., EST.
WJAS	1290	Pittsburgh, Pa., EST.	WNBH 1	1310	New Bedford, Mass.	WSPA	1420	Spartanburg, S. C., EST.
WJAX	900	Jacksonville, Fla., EST.	WNBO 1	1200	Washington Po EST	WSPD	1340	
WJAŶ	610	Cleveland, Ohio. EST.		1430	Washington, Pa., EST. Memphis, Tenn., CST.			Toledo, Ohio, EST
		Oleverand, Onio, 201.			Quality and D. FIGT	WSUI WSUN	880	lowa City, Iowa, CST.
		LoSollo III COM					620	
WJBC	1200	LaSalle Ill., CST.		1200	Carbondale, Pa., EST			St. Petersburg, Fla., EST.
		LaSalle III., CST. Red Bank, N. J., EST.	WNBW 1		Springfield, Vt., EST.	WSVS	1370	Buffalo, N. Y. EST.
WJBC	1200				Springfield, Vt., EST.			Buffalo, N. Y., EST.

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WSYB	1500	Rutland, Vt., EST.	XEAI	1090	Mexico City . Mex.	XER	735	Villa Acuna, Mex.
WSYR	570	Syracuse, N. Y., EST.	XEAN	750	Juarez, Mex., MST.	XES	1055	Tampico, Mex., CST.
WTAD	1440	Quincy, Ill., CST.	XEAO	560	Mexicali, Mex.	XET	690	Monterrey, Mex., CST.
WTAG	580	Worcester, Mass., EST.	XEAW	965	Reynosa, Mcx.	XETA	1140	Mexico City, Mex.
WTAM	1070	Cleveland, Ohio, EST.	XEB	1030	Mexico City, Mex., CST.	XETB	1380	Torreon, Mex.
WTAQ	1330	Eau Claire, Wis., CST.	XEC	1000	Toluca, Mcx.	XETF	630	Veracruz, Mex., CST
WTAR	780	Norfolk, Va., EST.	XED	1155	Guadalajara, Mex.	XETH	840	Puebla, Mcx.
WTAW	1120	College Station, Texas.	XEF	735	Viila Acuna, Mex.	XETM	845	Matamoros, Mex.
WTAX	1210	Springfield, Ill., CST.	XEFA	1250	Mexico City, Mex.	XETR	610	Mexico City, Mex
WTBO	1420	Cumberland, Md., EST.	XEFB	1315	Monterrey, Mex., CST	XETU	890	Pachuca, Mex.
WTEL	1310	Philadelphia, Pa., EST.	XEFC	1020	Merida, Mex.	XETW	830	Mexico City, Mex.
WTFI	1450	Athens, Ga., EST.	XEFD	855	Tia Juana, Mex.	XEU	1010	Veracruz, Mex., CST.
WTIC	1060	Hartford, Conn., EST.	XEFE	1000	Laredo, Mcs.	XEW	910	Mexico City, Mex., CST
WTJS	1310	Jackson, Tenn., CST.	XEFI	1000	Chibuahua, Mcx.	XEX	1210	Mexico City, Mex.
WTMJ	620	Milwaukee, Wis. CST.	XEFJ	1000	Monterrey, Mex.	XEY	546.8	Mexida, Mex.
WTNJ	1280	Trenton, N. J., EST.	XEFO	940	Mexico City. Mex., CST	XFB	1290	Jalapa, Mex.
WTOC	1260	Savannah, Ga., EST.	XEFS	1000	Queretaro, Mex., CST.	XFC	805	Aguascalientes, Mex.
WTRC	1310	Eikhart, Ind., CST.	XEFV	1370	Juarez, Mex.	XFG	638.3	Mexico City, Mex.
WWAE		Hammond, Ind., CST.	XEFW	1240	Tampico, Mex.	XFI	818.1	Mexico City, Mex.
WWJ	920	Detroit, Mich., EST.	XEFZ	1500	Coyoacan, Mex., CST.	XFO	940	Mexico City, Mex.
WWL_	850	New Orleans, La., CST.	XEG	1075	Mexico City, Mex.	XFX	860	Mexico City, Mex.
WWNC		Asheville, N. C., CST.	XEH	1132	Monterrey, Mex. CST.	YV1BC	960	Caracas, Venz.
WWRL		Woodside, N. Y., EST.	XEI	1310	Morelia, Mex., CST.	10-AB	1200	Moose Jaw, Sask. MST.
WWSW		Pittsburgh, Va., EST.	XEJ	1015	Juarez, Mex., CST.	10-AK	1200	Stratford, Ont., EST.
WWVA		Wheeling, W. Va., EST.	XEK	990	Mexico City, Mex.	10-AT	1158	Trail, B. C., PST
WXYZ	1240	Detroit, Mich., EST.	XEL	1000	Saltillo, Mex., CST.	10-BI	1200	Prince Albert, Sask.,
XEA	1000	Guadalajara, Mex., CST.	XEM	660	Matamoros, Mex.	10.80	4400	MST.
XEAB	1450	N. Laredo, Mex.	XEN	711	Mexico City, CST.	10-BP	1199	Wingham, Ont., EST.
XEAC	1295	San Luis Potosi, Mex.	XENT	1115	Neuvo Laredo, Mex.	10-BQ	1200	Brantford, Ont., EST.
XEAD	875	Mexico City, Mex.	XEP	780	Mexico City, Mex.	10-BU	1200	Canora, Sask.
			XEPN	585	Piedras Negras, Mex.			

# One Hundred Best Short Wave Stations By Frequencies and Wave Lengths

Submitted by our readers as being most regularly received. Times are given in Eastern Standard. First column gives frequency in megacycles (for kilocycles read the decimal point as a comma) and the second column, wave-lengths in meters. For complete lists of short-wave stations see the following issues of this magazine:

For complete lists of show we statistic by countries. September: Foreign stations arranged by countries. November: American stations by states. December: Canadian stations by provinces and Complete list by call letters. April: Complete list by frequencies and waves. Stations marked with an asterisk (\*) will not verify.

			•		
	Broad	cast B. Phone P.	6.116	49.02	W2XE, Wayne, N. J., 6-11 p.m. B
4.174	71.82	British Ships P	6.119	49.00	YV1BC, Caracas, Venz. Relays 960 kcs.
4.174	71.82	German Ships P			10:30 a.m1 p.m.; 5:15-10 p.m. B
4.283	70.00	Italian Ships P	6.125	48.95	YV11BMO, Maracaibo, Venz., 8-11 p.m.
4.513	66.43	VPN, Nassau, Bahamas, Phones Hialeah P			B
4.753	63.0 <b>8</b>	*WOO, Ocean Gate, N. J. Phones Ships P	6.140	48.83	W8XK, Pittsburgh, Pa. Relays KDKA
5.045	59.42	*VRT-ZFA Hamilton, Bermuda. Phones			4-11 p.m. B
		WNB-GMBJ nights P	6.246		*HJ3ABF, Bogota, Colombia, 8-11 p.m. B
5.766	52.00	XAM Merida, Yucatan. Tests XDA 10	6.272	47.80	HI1A, Santiago de los Caballeros, S. Domingo 1:40-4:40 p.m. Sunday B
		a.m8 p.m. irreg.	6.378	47.00	Domingo, 1:40-4:40 p.m., Sunday B HJ5ABB, Cali, Colombia B
5.879	51.00		6.618		PRADO, Riobamba, Ecuador, Thur. 9-11
5 005	E0 00	8 p.m. irreg. P	0.010	40.01	p.m. B
5.925	50.60	HJ4ABE, Medellin, Colombia. Mon., Wed., Fri., 7:30 to 10:30 p.m.; Tues.,	6 648	45.10	IAC, Coltano, Italy. Testing irreg. P
		Thur., Sat., Sun., 6-8 p.m. B		44.91	DGK, Nauen, Germany. Heard 9 p.m.
5 006	50.00	RV59, Moscow, USSR. 3-6 p.m. B	0.070		with WEJ P
0.000	00.00	HJ1ABB, Barranquilla, Colembia. 8-10	6.752	44.41	*WOA, Lawrenceville, N. J. Phones Eng-
		p.m. B	0.1.0=		land P
6.005	49.93	VE9DR, Montreal, Quebec. Daily, 7:30	6.888	43.54	*KEQ, Kahuku, Hawaii. Phones Cali-
		a.mmid. Sunday, noon-11 p.m. B			fornia nights P
6.017	49.83	DJC, Zeesen, Germany B	7.139	42.00	HJ4ABB, Nanizales, Colombia, Sat. 10
6.040	<b>49</b> .64	W1XAL, Boston, Mass. Irregular B			p.mmid. B
6.050	49.56	GSA, Daventry, England. To Canada 6-	7.396		*WEM, Rocky Point, N. Y. P
		d p.m.e B	7.465	40.16	*HJP, Bogota, Colombia. Phones Hialeah
6.057		W3XAU, Philadelphia, Pa., irreg. B		00.00	*KDK KKH Kabala Hamii 0
6.070	49.39	VE9CS, Vancouver, B. C., Fri. 12:30-1:45	7.518	39.89	*KDK-KKH, Kahuku, Hawaii, 9 p.m. and
	10.00	a.m.; noon to mid. B	7.685	39.01	2 a.m. TIR, Cartago, Costa Rica. Phones
6.090	<b>49</b> .23	VE9BJ, St. John, N. E., 5 p.m. and 11	1.000	99.01	Hialeah P
6.092	49.22	p.m., VE9GW, Bowmanville, Ont., irreg. B	7.790	38.49	HBP, Geneva, Switzerland, Sun. 5-5:45
6.092	49.22	W9XF, Chicago, Ill., 4:30-8 p.m.; 9:30	1.130	00.40	D.M. B
0.090	40.10	p.m2 a.m. B	8.103	37.00	HCJB, Quito, Ecuador, 7:30-9:45 p.m. B
6.096	49.17	W3XAL, Boundbrook, N. J., Sat. 4:30	0.100	0.100	Except Monday.
0.000	10.11	p.m1 a.m. B	8.328	36.00	German Ships P
		Press, a second			

### 100 BEST S. W. STATIONS

8.464	35.42	DAF, Norden, Germany. Phones Ships	12.839	
8.562	35.02	*WOO, Ocean Gate, N. J. Phones Ships P	$13.035 \\ 13.219$	
8.566	35.00	Italian Ships P	13.296	
8.831	33.95	British Ships P	10 007	
9.012 9.273	$33.27 \\ 32.33$	KEJ, Bolinas, Calif. Tests irregularly P GCB, Rugby, England. Phones Canada	13.337	
~ ~ ~ ^		nights P	13.500	
9.290 9.340	$\frac{32.27}{32.10}$	Rabat, Morocco. Sun., 2:30-5 p.m. B CGA, Drummondville, Quebec. Phones	13.816	
0 110		England nights P		
9.410 9.480	$\frac{31.86}{31.63}$	PLV, Bandoeng, Java. Irregular P PLW, Bandoeng, Java. Phones Australia 3-8 a.m. irreg. P	14.450	
9.503	31.55	VRJME, Meinourne, Australia. Wed.	14.480	
9.510	31.53			
9.520	31.49	GSB. Daventry, England. To S. Africa 1-5:30 p.m. To Canada 6-8 p.m. B OXY, Skamleback, Denmark, 2-6:30 p.m.	14.545	
9.530	31.46	B W2XAF, Schenectady, N. Y., 7 to 11 p.m.	$14.550 \\ 14.682$	
9.552	31.38	B DJA, Zeeoen, Germany, 2 p.m6:30 p.m.	14.930	
9.560	31.36	B W1XAZ, Springfield, Mass., 7 a.m1 a.m.	14.991	
9.580	31.30	B HBL, Geneva, Switzerland, Sun., 5-5:45	15.055	
01.500	01.00		15.120	
9.585	31.28	GSC, Daventry, England, 4:30-6:30 a.m.:	15.140	
		8:30 a.m12:30 p.m.: 1-5:30 p.m.: 6-8	15.190	
0 505	91.00	p.m. B W3XAU, Philadelphia, Pa., irregular B VK2ME, Sydney, Australia, Sun., 1-3	15.204	
9.585 9.585	$\frac{31.28}{31.28}$	W3XAU, Philadelphin, Pa., irregular B	15.234	
		a.m.; 5-9 al.m.; 10:30 a.m12:30 p.m. B	15.258	
9.592	31.25	CTIAA, Lisbon, Portugal. TuesFri.	15.320	
9.67	31.00	5:30-6:30 n m B	15.410	
9.702	30.90	LQA, Buenos Aires, Argentina. P	15.863	
$9.862 \\ 9.895$	30.40 30.30	LQA, Buenos Aires, Argentina. P EAQ, Madrid, Spain. 5:30-7 p.m. B LSN, Buenos Aires, Argentina, 6 p.m. and	16.024	
10.060	<b>29.80</b>	6 a.m. P *VRT-ZFB, Hamilton, Bermuda. Phones	17.512	
10.163	29.50	German Ships P	17.770	
10.212	29.35	PSH, Rio de Janeiro, Brazil. Tests W2XBL ovenings	17.761	
10.246	29.26	DIQ, Nauen, Germany B		
10.520	28.50	VK2ME, Sydney, Australia. Irreg. P	17.772	
11.174	26.83	5 6:20 n m · Sup 10:20 nuon P	17.830	
41.530	26.00	DIQ, Nauen, Germany B VK2ME, Sydney, Australia. Irreg. P CT3AQ, Funchal, Madeira. TuesThurs., 5-6:30 p.m.; Sun., 10:30-noon B XAM, Merida, Yucatan P	18.116	
11.710	25.60	VE9JR. Winnipeg. Manitoba, Tues.	18.296	
11.710	25.60	6:30-8:30 p.m.; Fri., to 9 B Pontoise, France. 4-7 p.m. B PHOHI, Eindhoven, Holland B	18.444	
11.725	25.57	PHOHI, Eindhoven, Holland B		
11.750	25.51	GSD, Daventry, England. To Occania	18.611	
		4:30-6:30 a.m.; 1-5:30 p.m. B		
11.753	25.51	DJD, Koenigswusterhausen, Germany. 1- 6 p.m. B	18.670 18.820	
1.760	25.50	*XDA, Mexico City. Tests XAM 1 p.m.		
41.800	25.40	I2RO, Rome, Italy, 11 a.m12:30 p.m.:	18.958	
11.823	25.36	1-6 p.m. B W2XE, Wayne, N. J. 3-5 p.m. B GSE, Daventry, England. To India 8:30	19.282	
41.865	25.27	a.m12:30 p.m. B	19.678	
11.872	25.25	W8XK, Pittsburgh, Pa. Relays KDKA 4-10 p.m. B	19.684 19.895	
41.898	25.20	Pontoise, France. 11:30 a.m2:30 p.m. B	01.000	
12.000 12.148	$24.98 \\ 24.68$	FZS, Saigon, Indo-China. 9-10 a.m. P GBS, Rugby, England. Phones N. Y.	21.020	
12.241	24.41	afternoon P GBU, Rugby, England. Phones N. Y.	21.054	
12.394	24.19	nights P DAF, Norden, Germany, Phones Ships	21.069 21.400	
10 000	02.20	P	01.470	
12.820	23.38	CNR, Rabat, Morocco. Sun., 7:30 a.m 9 a.m. B	$21.470 \\ 21.451$	
A C	mnl	ate List of S. W. Stations o	f the	

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0.000	00.00	WOO O O O N I D OU D
2.839	23.36 23.00	WOO, Ocean Gate, N. J. Phones Ships P German Ships P
$3.035 \\ 3.219$	22.68	British Ships P
3.296	22.55	CGA, Drummondville, Que. 9 a.m2
		p.m. *YVQ, Maracay, Venezuela. Phones Hia-
3.337	22.48	*YVQ, Maracay, Venezuela. Phones Hia- leah, days P
3.500	22.09	leah, days GBB, Rugby, England. Talks Canada daytimes
3.816	21.70	SUZ, Cairo, Egypt. 7 a.m. and 3:30 p.m. P
4.450	20.75	GBW, Rugby, England, 6 a.m. and 6
4.480	20.70	p.m. P YMA, Managua, Nicaragua. Phones Hialeah, days P
		TIR, Cartago, Costa Rica. Phones Hialeah, days P
4.545	20.69	RXF, Panama City, Panama. Phones Hialeah, days P
4.550	20.60	HBJ, Geneva, Switzerland P
4.682	20.42	PSS. Rio de Janeiro, Brazil. 5-6 p.m. P
4.930	20.08	*HJB, Bogota, Colombia. Phones Hialeah
4.991	20.00	TOA Customala City Customala
5.055	19.91	*WNC Hislash Florida Dhonog Dan
5.120	19.83	HVJ, Vatiean City. 10-10:30 a.m. B
5.140	19.81	GSF, Daventry, England B
5.190 5.204	$19.73 \\ 19.72$	American stations, days HVJ, Vatiean City. 10-10:30 a.m. B GSF, Daventry, England B DJB, Zersen, Germany. 8 a.mnoon B W8XX Pittsburgh, Pa. Relays KDKA 9 am 4 p.m.
- 004	10.00	9 a.m4 p.m. B
5.234	19.68	Pontoise, France. 8 a.m11 a.m. B W2XE, Wayne, N. J. 11 a.m1 p.m. B
$5.258 \\ 5.320$	19.65 19.57	9 a.m4 p.m. B Pontoise, France. 8 a.m11 a.m. B W2XE, Wayne, N. J. 11 a.m1 p.m. B W2XAD, Schenestady, N. Y. Daily 1-3 com: 555 Surface.
5.410	19.46	KWO Dixon Calif. Phones Hawaii 2-7
5.863	18.90	p.m. P FTK Sta Assian France Dhonor Sairon
6.024	18.71	mornings P *KKP-KKU, Kahuku, Hawaii. Phones
7.512	17.12	Dixon, days. P DFB, Nauen, Germany. Phones Vene-
7.770	16.90	zuela, mornings GSG, Daventry, England. To India 9:30-11:30 am
7.761	16.88	PHI, Huizen, Holland, 5:40-11:40 a.m. B
7.772	16.87	W3XAL, Boundbrook, N. J. 8 a.m4
	10.00	p.m. B PCV. Kootwijk. Holland. 6-9 a.m. P
7.830 8.116	$16.82 \\ 16.55$	PČV, Kootwijk, Holland. 6-9 a.m. P LSY, Buenos Aires, Argentina P
8.296	16.39	*YVO Maracay Venezuela Heard about
8.444	16.25	*HJY. Bogota, Colombia, 11 a.m. and
8.611	16.11	GAIL Bugby England Phones N V
8.670	16.06	days *OCL Lima, Peru, 2 p.m. P
8.820	15.93	PLE, Bandoeng, Java. TuesFri., 5:40-
8.958	15.82	LSR, Buenos Aires, Arg. 11 a.m. and
9.282	15.55	4 p.m. P FTM St. Assise, France. 10 a.m2 p.m P
).678	15.24	*CEC, Santiago, Chile. 11 a.m. and 4 p.m. P
9.6 <b>84</b> 9.895	$15.23 \\ 15.07$	EAQ, Madrid, Spain. Phones P LSG, Buenos Aires, Argentina. 10:30
1.020	14.27	a.m3:30 p.m. P
1.054	14.24	and 4 p.m. P
		Р
L.069 L. <b>400</b>	14.23 14.01	PSA, Rio de Janeiro, Brazil. 8 a.m. P *WKK Lawrenceville, N. J. 8 a.m4 p.m. P
.470	13.96	GSH. Daventry, England B
.451	13.93	
		II was in the Annil income

A Complete List of S. W. Stations of the World was in the April issue.

# The Hundred Best S. W. Stations by Calls . . .

	1
British Ships	]
13.219 22.68	
8.831 33.95	
$\begin{array}{rrrrr} 13.219 & 22.68 \\ 8.831 & 33.95 \\ 4.174 & 71.82 \end{array}$	
*CEC Santiago,	Chile I 11 a.m4 p.m.
-CEC Bantiago,	
19.678 15.24	11 a.m4 p.m
13.296 22.55	9 a.m. to 2 p.m. Nights
9 340 32 10	Nighta
OND Dabat M	
CNR Rabat, M 12.820 23.38	100000
12.820 23.38 CT1AA Lisbon, 9.592 31.25	
CT1AA Lisbon	Portugal E
9.592 31.25	TuesFri. 5-7 p.m.
CT3AQ Funchal	Maderia H TuesThur. 5-6:30
11.174 26.83	Tuos Thur 5.6.3
11.174 20.00	1 uca 1 nut. 5-0.50
	p.m.; Sun. 10:30
	noon
DAF Norden, G 17.260 17.37 12.394 24.19 8.464 35.42	ermany H
17.260 17.37	Talks to Ships
12 304 24 10	
9 464 25 49	
0.101 00.12	
5.464 55.42 DFB Nauen, Ge 17.512 17.12 DGK Nauen, Ge 6.675 44.91	rmany I
17.512 17.12	Phones YVQ
DGK Nauen. Ge	ermany I
6 675 44 91	,
DIO Neuen Ge	rmany I
DIQ Nauen, Ger 10.246 29.26	шану 1
10.240 29.26	-
DJA Zeesen, Ge 9.552 31.38	rmany H
9.552 31.38	2 p.m6:30
DJR Zeesen Ge	rmany H
15 100 10 73	8 a m -noon
DIC Zampa Co	rmany H
DJB Zeesen, Ge 15.190 19.73 DJC Zeesen, Ge 6.017 49.83	rinaliy 1
0.017 49.83	Irregular
DJD Zeesen Ge	rmany i
11.753 25.51 DJE Zeesen, Ge	
DJE Zeesen Ge	rmany H
17 761 16 88	
FAO Madrid S	nain I
17.761 16.88 EAQ Madrid, S	pain I
EAQ Madrid, S 9.862 30.40	5:30-7 p.m.; Sat. I
9.862 30.40	5:30-7 p.m.; Sat. I 3 n.m.
9.862 30.40 19.684 15.23	5:30-7 p.m.; Sat. I 3 p.m. Phones
9.862 30.40 19.684 15.23	5:30-7 p.m.; Sat. I 3 p.m. Phones
9.862 30.40 19.684 15.23 FTK Ste. Assise 15.863 18.90	5:30-7 p.m.; Sat. I 3 p.m. Phones France I Phones Saigon
9.862 30.40 19.684 15.23 FTK Ste. Assise 15.863 18.90	5:30-7 p.m.; Sat. I 3 p.m. Phones France I Phones Saigon
9.862 30.40 19.684 15.23 FTK Ste. Assise 15.863 18.90	5:30-7 p.m.; Sat. I 3 p.m. Phones France I Phones Saigon
9.862 30.40 19.684 15.23 FTK Ste. Assise 15.863 18.90 FTM St. Assise, 19.282 15.55	5:30-7 p.m.; Sat. I 3 p.m. Phones c, France I Phones Saigon France I 10 a.m2 p.m.
9.862 30.40 19.684 15.23 FTK Ste. Assise 15.863 18.90 FTM St. Assise, 19.282 15.55	5:30-7 p.m.; Sat. I 3 p.m. Phones c, France I Phones Saigon France I 10 a.m2 p.m.
9.862 30.40 19.684 15.23 FTK Ste. Assise 15.863 18.90 FTM St. Assise, 19.282 15.55 FZS Saigon Ind 12.000 24.98	5:30-7 p.m.; Sat. I 3 p.m. Phones , France I Phones Saigon France I 10 a.m2 p.m. o-China I 9-10 a.m.
9.862 30.40 19.684 15.23 FTK Ste. Assise 15.863 18.90 FTM St. Assise, 19.282 15.55 FZS Saigon Ind 12.000 24.98	5:30-7 p.m.; Sat. I 3 p.m. Phones c, France I Phones Saigon France I 10 a.m2 p.m.
9.862 30.40 19.684 15.23 FTK Ste. Assise 15.863 18.90 FTM St. Assise, 19.282 15.55 FZS Saigon Ind 12.000 24.98 German Ships	5:30-7 p.m.; Sat. I 3 p.m. Phones , France I Phones Saigon France I 10 a.m2 p.m. o-China I 9-10 a.m.
9.862 30.40 19.684 15.23 FTK Ste. Assise 15.863 18.90 FTM St. Assise, 19.282 15.55 FZS Saigon Ind 12.000 24.98 German Ships 13.035 23.00	5:30-7 p.m.; Sat. I 3 p.m. Phones , France I Phones Saigon France I 10 a.m2 p.m. o-China I 9-10 a.m.
9.862 30.40 19.684 15.23 FTK Ste. Assise 15.863 18.90 FTM St. Assise, 19.282 15.55 FZS Saigon Ind 12.000 24.98 German Ships 13.035 23.00	5:30-7 p.m.; Sat. I 3 p.m. Phones , France I Phones Saigon France I 10 a.m2 p.m. o-China I 9-10 a.m.
9.862 30.40 19.684 15.23 FTK Ste. Assise 15.863 18.90 FTM St. Assise, 19.282 15.55 FZS Saigon Ind 12.000 24.98 German Ships 13.035 23.00	5:30-7 p.m.; Sat. I 3 p.m. Phones , France I Phones Saigon France I 10 a.m2 p.m. o-China I 9-10 a.m.
9.862 30.40 19.684 15.23 FTK Ste. Assise 15.863 18.90 FTM St. Assise, 19.282 15.55 FZS Salgcon Ind 12.000 24.98 German Shipe 13.035 23.00 0.163 29.50 8.328 36.00 4.174 71 82	5.30-7 p.m.; Sat. I 3 p.m. Phones , France   Phones Saigon France   10 a.m2 p.m. o-China   9-10 a.m.
9.862 30.40 19.684 15.23 FTK Ste. Assise 15.863 18.90 FTM St. Assise, 19.282 15.55 FZS Salgcon Ind 12.000 24.98 German Shipe 13.035 23.00 0.163 29.50 8.328 36.00 4.174 71 82	5.30-7 p.m.; Sat. I 3 p.m. Phones , France   Phones Saigon France   10 a.m2 p.m. o-China   9-10 a.m.
9.862 30.40 19.684 15.23 FTK 514. Assise 15.863 18.90 FTM St. Assise 19.282 15.55 FZS Salgcon.Ind 12.000 24.98 German Ships 13.035 23.00 10.163 29.50 8.328 36.00 4.174 71.82 GAU Rugby, E. 18.611 16.11	5.30-7 p.m.; Sat. I 3 p.m. Phones , France 1 Phones Saigon France 1 10 a.m2 p.m. o-China 1 9-10 a.m. 1 mgland 1 Phones N. Y., days
9.862 30.40 19.684 15.23 FTK 514. Assise 15.863 18.90 FTM St. Assise 19.282 15.55 FZS Salgcon.Ind 12.000 24.98 German Ships 13.035 23.00 10.163 29.50 8.328 36.00 4.174 71.82 GAU Rugby, E. 18.611 16.11	5.30-7 p.m.; Sat. I 3 p.m. Phones , France 1 Phones Saigon France 1 10 a.m2 p.m. o-China 1 9-10 a.m. 1 mgland 1 Phones N. Y., days
9.862 30.40 19.684 15.23 FTK 514. Assise 15.863 18.90 FTM St. Assise 19.282 15.55 FZS Salgcon.Ind 12.000 24.98 German Ships 13.035 23.00 10.163 29.50 8.328 36.00 4.174 71.82 GAU Rugby, E. 18.611 16.11	5.30-7 p.m.; Sat. I 3 p.m. Phones , France 1 Phones Saigon France 1 10 a.m2 p.m. o-China 1 9-10 a.m. 1 mgland 1 Phones N. Y., days
9.862 30.40 19.684 15.23 FTK Stc. Assise 15.863 18.90 FTM St. Assise, 19.282 15.55 FZS Salgon. Ind 12.000 24.98 German Ships 13.035 23.00 10.163 29.50 8.328 36.00 4.174 71.82 GAU Rugby, E. 18.611 16.11 GBB Rugby, E. 13.500 22.09	5.30-7 p.m.; Sat. I 3 p.m. Phones , France I Phones Saigon France I 10 a.m2 p.m. o-China I 9-10 a.m.
9.862 30.40 19.684 15.23 FTK Stc. Assise 15.863 18.90 FTM St. Assise, 19.282 15.55 FZS Salgon. Ind 12.000 24.98 German Ships 13.035 23.00 10.163 29.50 8.328 36.00 4.174 71.82 GAU Rugby, E. 18.611 16.11 GBB Rugby, E. 13.500 22.09	5.30-7 p.m.; Sat. I 3 p.m. Phones , France I Phones Saigon France I 10 a.m2 p.m. o-China I 9-10 a.m.
9.862 30.40 19.684 15.23 FTK Stc. Assist 15.863 18.90 FTM St. Assise, 19.282 15.55 FZS Saigon Ind 12.000 24.98 German Shipa 13.035 23.00 10.163 29.50 8.328 36.00 4.174 71.82 GAU Rugby, E 18.611 16.11 GBB Rugby, E 13.500 22.09 GBS Rugby, E 12.148 24.68	5.30-7 p.m.; Sat. I 3 p.m. Phones , France I Phones Saigon France I 10 a.m2 p.m. o-China I 9-10 a.m. I 9-10 a.m. I hopes N.Y., days gland I Phones N.Y. days
9.862 30.40 19.684 15.23 FTK Stc. Assist 15.863 18.90 FTM St. Assise, 19.282 15.55 FZS Saigon Ind 12.000 24.98 German Shipa 13.035 23.00 10.163 29.50 8.328 36.00 4.174 71.82 GAU Rugby, E 18.611 16.11 GBB Rugby, E 13.500 22.09 GBS Rugby, E 12.148 24.68	5.30-7 p.m.; Sat. I 3 p.m. Phones , France I Phones Saigon France I 10 a.m2 p.m. o-China I 9-10 a.m. I 9-10 a.m. I hopes N.Y., days gland I Phones N.Y. days
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9.862 30.40 19.684 15.23 FTK Ste. Assise 15.863 18.90 FTM St. Assise 19.282 15.55 FZS Saigon Ind 12.000 24.98 German Shipe 13.035 23.00 0.163 29.50 8.328 36.00 4.174 71.82 GAU Rugby, El 13.500 22.09 GBS Rugby, Er 12.148 24.68 GBU Rugby, El 12.241 24.41 GBW Rugby, El 12.241 24.41 GBW Rugby, 26 21.242 24.41 CBW Rugby, 27 5.245 CBU Rugby, 28 12.242 24.68 CBU Rugby, 28 12.241 24.41 CBW Rugby, 20 75 14.242 14.24 15.20 15.50	5.30-7 p.m.; Sat. I 3 p.m. Phones , France I Phones Saigon France I 10 a.m2 p.m. o-China I 9-10 a.m. Phones N. Y., days Igland I Phones N. Y., days Igland I Phones N. Y., days Igland I Phones N. Y., night
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6.246       48.00       11 p.m.         HJ4ABB       Manizales, Colombia         7.139       42.00       Sat. 10 p.m. mid.         HJ4ABE       Medellin, Colombia       5.925       50.60       Mon., Wed., F         7.30-10:30 p.       Tues, Thurs., Turs., Turs	B ri.;; B B B B B B B F B ; P P P
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6 (246)       48.00       11 p.m.         HJ4ABB       Manizales, Colombia         7.139       42.00       Sat. 10 p.m. mid.         HJ4ABE       Medellin, Colombia       5.925       50.60       Mon., Wed., F         7.30-10:30 p.       Tues, Thurs., and Sun., 6-8 p       6.378       47.00         HJ5ABB       Cali, Colombia       6.378       45.10         HVJ       Vatican Clty       15.120       19.83       10-10:30 a.m.         IAC       Coltano, Italy       6.648       45.10         12RO       Rome, Italy       2:30-5:30 p.m.       2:30-5:30 p.m.         Italian Shipe       8.566       35.00       4.283       70.00         *KDK-KKH       Kahuku, Hawaii       7.518       39.89       9 p.m2 a.m.         *KEJ       Bolinas, Calif.       9.012       33.27         *KKP       Kahuku, Hawaii       16.024       18.71         *KWO       Dixon, Calif.       15.410       19.46       2-5 p.m.         LQA       Buenos Aires, Argentina       9.702       30.90	B B Fri.,; B B B B B B B B P B B P P P P P P P
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LSN Buenos Aires, Arg.	P
9.895 30.30 6 p.m6 a.m. 21.020 14.27 8 a.m4 p.m.	
9.895 30.30 6 p.m6 a.m. 21.020 14.27 8 a.m4 p.m. LSR Buenos Aires, Arg. 18.958 15.82 11 a.m4 p.m.	Р
LSY BUENOS AIRES ARE.	Р
18.116 16.55 *OCI Lima, Peru 18.670 16.06 2 p.m.	Р
18.670 16.06 2 p.m.	-
OXY Skamleback, Denmark 9.520 31.49 2-6:30 p.m.	В
PCV Kootwijk Holland 17.830 16.82 6-9 a.m.	Р
PHI Huizen, Holland 17.761 16.88 Irregular	В
17.761 16.88 Irregular PHOHI Huizen, Holland	в
PHOHI Huizen, Holland 11.725 25.57 BLE: Bandcong Java	р
11.725 25.57 PLE Bandoeng Java 18.820 15.93 Tues., Frt., 5: 10:40 a.m.	40-
10:40 a.m. PLV Bandoeng, Java	Р
	р
9.480 31.63	-
Pontoise, France 15 234 19 68 8-11 a.m	в
11.898 25.20 11:30 a.m2:30 p.	m.
9.410 31.80 PLW Bandoeng, Java 9.480 31.63 Pontoise, France 15.234 19.68 8-11 a.m. 11.898 25.20 11:30 a.m2:30 p. 11.710 25.60 4-7 p.m. PRADO Riobamba, Ecuador 6.618 45.31 Thurs, 9-11 p.m. PSA Pia da Ianairo Rezail	в
6.618 45.31 Thurs., 9-11 p.m. PSA Rio de Janeiro, Brazil	Р
21.069 14.23 8 a.m.	P
PSH Rio de Janeiro, Brazil 10.212 29.35	
PSS Rio de Janeiro, Brazil 14.692 20.42 5-6 p.m.	Р
Rabat, Morocco 9 290 32 27 Sun 3-5 nm	B
RAU Tashkent, USSR.	P
Rabat, Morocco         9.290         32.27         Sun.         3-5 p.m.           RAU         Tashkent, USSR.         15.104         19.85         Phones Moscow           RV59         Moscow, USSR         5.996         50.0         3-7 p.m.	В
RV59 Moscow, USSR 5.996 50.0 3-7 p.m. *RXC Panama City, Panama	Р
14.485 20.69	
SUZ Cairo. Egypt 13.816 21.70 7 a.m3:30 p.m.	Р
TGA Guatemala City, Guatemala	Р
14.991 20.00 TIR Cartago, Costa Rica 14.484 20.7	Р
TINDE Unadia Conta Dian	В
9.670 31.00 5:30-6:30 p.m. VE9BJ St. John, N. B.	В
144/WH Hereua. Coda Arca 9,670 31.00 5:30-6:30 p.m. VE9BJ St. John, N. B. 6,090 49.23 5 p.m11 p.m. VE9CS Vancouver, B. C. 6,070 49.39 Daily, 8-10 p.m.	в
6.070 49.39 Daily, 8-10 p.m.	
VE9DR Montreal Que. 6.005 49.93 7:30 a.mmid.; Su	n.
noon to 11:15 p.	B
6.092 49.22 Irregular VE9JR Winnipeg, Man. 11.710 25.00 Tues. 6:30-8:30 p.	в
11.710 25.00 Tues. 6:30-8:30 p. Fri. to 9.	m.
VK2ME Sydney, Australia	В
19.520 28.50 9.585 31.28 Sun., 1-3 a.m.;	5-0
VK3ME Melbourne, Australia 9.503 31.55 Wed. 5-6:30 a.1 Sat. 5-7 a.m.	ם m.;
Sat. 5-7 a.m. VPN Nassau, Bahamas.	Р
4.508 66.50 Phones WNC	•

*VRT-ZFA Hamilton, Bermuda P 5.045 59.42		6.095 49.18 4:30-8 p.m.; 9:30-2
*VRT-ZFB Hamilton, Bermuda P 10.060 29.80 *WEM Rocky Point, N. Y. P	Sun. to 4. W2XAF Schenectady, N. Y. B 9.530 31.46 Daily, 7-11 p.m. W2XE Wayne, N. J. B	a.m. XAM Merida Yucatan P 5.766 52.00 11.530 26.00
7.396 40.54 *WKA Lawrenceville, N. J. P 21.054 14.24 8 a.m. 4 p.m. *WKK Lawrenceville, N. J. P	15.258 19.65 11 a.m1 p.m. 11.823 25.36 3-5 p.m. 6.116 49.02 6-11 p.m.	*XDA Mexico City P 5.879 51.00 11.760 25.50
*WNC Hialeah, Florida P	W3XAL Boundbrook, N. J. B 6.096 49.17 Sat. 4:30 p.m1 a.m.	YMA Managua, Nicaragua P 14.480 20.70
15.051 19.92 Phones Pan-Ameri- can stations	17.772 16.87 8 a.m4 p.m. W3XAU Philadelphia, Pa. B 9.585 31.28 Irregular	*YVQ Maracay Venezuela P
*WOO Ocean Gate, N. J. P	6.057 49.50	
12.839 23.36 Phones Ships 8.561 35.02 4.749 63.13	6.140 48.83 Relays KDKA 4-11 p.m.	YV1BC Caracas, Venz. B 5.119 49.00 Relays 960 kcs.;
W1XAL Boston, Mass. B 6.040 49.64 Irregular	11.872 25.25 15.204 19.72 Relays KDKA 9 в.	10:30 a.m1 p.m. ; 5:15-10 p.m
W1XAZ Springfield, Mass. B 9.560 31.36 7:00 a.m1:00 a.m.	m4 p.m. 21.451 13.93 9 a.m2 p.m.	YV11BMO Maracaibo, Venz. B 6.125 48.95 8-11 p.m.

# Tuning in Britain

#### (Continued from page 34)

very good indeed, considering its small power. On one occasion recently, the writer received six U. S. stations equally as strong as some of the Continental high-power stations.

Usually, the stations working on waves above 1000 kcs. come over the best.

\*12 Old Bridge Terrace, Deansgate, Grimsby, Lincolnshire, England.

### Index to Past Issues

It being quite impossible to include all station data, both broadcast and short wave, in any one issue of this magazine, the various lists must necessarily appear irregularly. Beginning with this issue, we are publishing on the last page a Quick Index to Station Data showing the last edition in which the various data appeared.

Mrs. E. B. H. Wyckoff, Lansing, Mich.

### Building the Logs

#### (Continued from page 33)

quite well and sometimes as early as midnight."

"My log has increased by about a hundred stations since I wrote last," reports Marian Canniff, 2112 S. Cedar St., Lansing, Mich. "I have quite a few pretty good catches in Cuba and Mexico, but my best catches are YV1BC, WKAQ and HJN. I'm a long way from the stage where it's hard to get new stations. There are always plenty of 100-watters on that I haven't logged yet. Wish I'd have some luck and get an Australian station—or something!"

"I became interested in your magazine when I noticed that you gave the time of the stations on the air," comments \*Wm. Wheatley, 87-48-124th St., Richmond Hill, N. Y. "This was in October and here is my log since then: Every channel from 540 kcys. to 1500; 305 stations, 40 states, and 165 cities; 8 stations in Mexico; 10 in Canada, 15 in Cuba, and 2 in Nova Scotia."

"Yesterday, January 15th, marked the first anniversary of my present set, a Kennedy," remarks \*Roy V. Heatter, 7805 So. Peoria St., Chicago, Ill. "A summary of my log shows 432 stations heard for the first

<sup>&</sup>quot;This is just to note how fine every copy is. Why I haven't owned every copy since its first number, I can't tell. It is high-class in every way—a great comfort to home listeners especially. Its department of trouble queries is very instructive. The DX features are very intriguing—they broaden our horizons so much. The list of classified programs is invaluable. \* \* In fact, it is an indispensable visitor to my library-table every month. More power to you."

#### THE RADEX MARKET PLACE

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AMPLIVOX LABORATORIES, 82 East 95th St., Brooklyn, N. Y.

year, with 163 verified. They were divided as follows: U. S. 390; Canada 23; Cuba 11; Mexico 8; 45 states heard, those missing being Rhode Island, Maine and Delaware."

"I have a 6-tube Mohawk d.c. set," advises George L. Richardson, Phillips Exeter Academy, Exeter, N. H. "I use two antennas at right angles to each other. I have now a total of 197 stations, rather poor compared to some of your readers' records, but not bad for a year of DXing. I can get XER in the daytime, at noon, and at night KFI and WQAM roar in like locals."

"Have been a DXer since January, 1932, and have logged 317 stations in the U. S., Canada, Mexico, Cuba, Porto Rico, and YV1BC, Caracas, Venezuela, and HJN, Bogota, Colombia, which are my best catches," writes \*Lowell F. Barrows, 275 N. Union St., Delaware, Ohio. "I have verifications from 239. This winter has been a wonderful DX season. I am using a 10-tube Majestic superhet, Model 215, with dual speakers. This model has given me wonderful satisfaction."

"I am located in rather a bad place (on the heel of Cape Cod) with Cape Cod Bay 14 miles north and the Vineyard Sound and Atlantic Ocean south," remarks Walter L. Gates, Box 143, Teaticket, Mass. "Of course we have the Atlantic east of us. Porto Rico, Cuba, Santo Domingo come in good. Charlotte, N. C., Chattanooga, Abilene, Omaha, Minneapolis, Winnipeg, Toronto, Montreal, Moncton, N. B., are my limits."

"I began DXing four months ago for the first time since I bought my radio in June," writes Ramon M. Marti, Central St. No. 26, Santurce, Porto Rico. "and I have already 175 stations, among which I have 3 Europeans, 3 Argentinas, one Colombia, 2 Venezuela, one Dominican, 10 Mexican, 9 Cuban, 10 Canadian, and the rest Americans. Considering that Porto Rico is nearly 1000 miles or over of nearly all radio stations, I four think that 175 stations in months is something."

"Since last summer I have doubled my total of stations picked up, from less than 100 to 195," remarks Gustave Solomon, 404 Bon Accord Block, Winnipeg, Man. "I have only five more channels to get and another 12 states. The fall and winter are the best time for DXing for reception is then best. However, DXing can be carried on all year. It was during the summer that I first logged CMAF and also heard KOB several times."

With his Atwater Kent 89, Luther E. Grim, 505 South Main Street, Red Lion, Pa., has brought in every state in the U. S., every province of Canada, Newfoundland, Hawaii, Cuba, Mexico, Venezuela, Colombia, Porto Rico, France and New Zealand. On the morning of January 15th, he heard KFYO, 100 watts, Lubbock, Texas, and KFPM, 15 watts, Greenville, Texas, on the same channel at the same time and the 15watter was steadier than the hundred.

"With the help of RADEX, in six nights of DX I increased my log by 24 stations," advises \*W. C. Littlewood, 1960 East 72nd Place, Chicago, Ill. "Each of these was a Saturday or early Sunday morning, as this is the only time I have to DX, except in the early evening. I have a homemade two-tube receiver and in about 2½ months I have logged 162 stations on the broadcast band, including 35 states, Mexico, Cuba and Canada."

"With the aid of your DX Calendar," advises Howard Evans, 180 So. Main St., East Hartford, Conn., "I have logged and verified 10-AB, Moose Jaw, 25 watts, 1650 miles, rating 66, on February 19th. KFPM, logged and verified, is still my rarest catch, rating 91.66. I also tuned in HJN Bogota, on February 26th, and am awaiting their verification. I have a 7-tube Brunswick, bought in December, 1931."

"Up to date I have received 376 stations, including 2YA, KGU, WKAQ, VAS, and all the states but New Hampshire and Vermont," reports John E. Waggoner, 1706 Hudson Court, Lawrenceville, Ill. "I have at least one station on all of the ninety-six channels. I own an Atwater Kent 60 and it has never failed to give satisfaction."

"My mileage for stations logged is over 2¼ million miles," reports R. A. Butts, 203 S. Main St., Ellensburg, Wash. "I am enclosing entire list of my log. I logged my great list of stations this winter, 291 all told. I logged 239 in 1927 during the trans-Atlantic tests which showed 490,000 miles against 425,000 this winter."

"Ever since I bought my first copy of RADEX my log has increased by leaps and bounds," says Rudolph Maxwell, Jr., 4815 Ward St., Cincinnati, Ohio. "In December, 1932, I had recorded 59 stations and then I bought my first copy of RADEX. Well, that must have been the magic word, because I have pulled in 170 stations to date (January 30th)."

"I have 365 stations logged with

290 verified," reports Harry McPoyle, 1411 N. Edgewood St., West Philadelphia, Pa. "I never had a European station, but have logged them in Cuba, Canada, Mexico and Porto Rico. I am an ardent DX fan. Have been since the old one-tube WD11 days, when WDAP in Chicago was my first DX station."

"I am an old DX fan," comments Norman Wilkin, Columbus, Wis. "Since August, 1928, I have received 507 broadcasters. This includes all 48 states, 25 in Canada, 11 in Mexico, 7 in Cuba, Porto Rico and Bogota, Colombia. I have access to three 100-foot aerials, each running in a separate direction. I use a cistern for a ground."

"I have only been DXing since last August, by this I mean logging them," remarks \*Ernest Davidson, 46 Hogarth Ave., Toronto 6, Ont. "I have 191 stations, 96 channels and 39 states. I use a Northern Electric 'Minaki' 5-tube midget. For an aerial I have two four-inch copper balls, 30 feet high, joined to a common lead-in. The ground is the cold water pipe."

"I think I've made quite a record with a Graybar table model 7-tube superhet," says \*Paul Heeley, 1220 W. Jackson St., Painesville, Ohio. "In just exactly three weeks I've logged 288 stations. My best catches on this set are as follows: CMJK, YV1BC, 10-AT, 10-BP, CKWX, KOH, WRDO, KID and KBTM."

"I have 387 stations logged so far with 120 verified," reports \*W. H. Lewis, 1328 Delaware St., Leavenworth, Kans. "I have succeeded in logging and verifying 10-AB, 10-BQ and KFPM. So far I have not logged any European or Australian or Japanese stations on the b.c. band, but I have succeeded in logging HPB, Geneva, on the short waves."

"I have been Dxing since April, 1932," writes Mrs. Peter Fanelli, 36 So. High St., Passaic, N. J., "and have 310 stations verified, including Cubans, Mexicans, Canadians, one Porto Rican, and YV1BC, also 10-BQ and 10-BP. I think it's not so bad for a beginner. I use a Radiola 66 superhet."

"I took a notion to try my hand at DXing again, after a long layoff," remarks W. D. Crawford, 619 Victor St., Winnipeg, Man., "so I traded in my Radiola 33 and got a Northern Electric all-wave set. In two weeks' time I picked up 200 stations, including GSC, Daventry; FTM, Pontoise; VLK, Sydney, Australia; DOA, Doeberitz, Germany."

The Colorado altitudes must be favorable to distant reception from the report of Harold R. Jordan, 22 West Cheyenne Road, Colorado Springs. Among his distant stations are Porto Rico, Hawaii, Venezuela, New Zealand and Australia and 17 in Japan. He gets the larger JO's with volume control in lowest position.

Porto Rico, Dominican Republic, Venezuela, Colombia, France, New Zealand and eight from Australia are reported from Ann Arbor, Mich., by Richard M. Carter, 1315 Washtenaw Ave. Richard has now completed his full roster of the states and the provinces of Canada.

From Tampa, Florida, A. L. Beaty, 1207 33rd Ave., reports the reception of JOAK in Japan and 4RK, 4GQ, 2YA, 5CK and 2BL in the Antipodes, 10-BQ, 10-AB and VAS from the northern Dominions and KGU from Hawaii.

From away down in Key West, \*A. A. Wiggin, 1206 South Street, gets the following stations in the middle of the day on his Majestic: WWL, WFAA, WLW, WSM, WEAF, WHAS, WBT.

"I now have an Ekko stamp from each of the 48 states," boasts R. L. Brown, 413 30th St., McKeesport, Pa. "I use a Majestic 7-tube screen grid set Model 132."

# The Short Waves

#### (Continued from page 10)

EAQ announces, "Ay ah koo, Radiodifusion Ibero-Americano, Madrid, España."

PRADO calls, "Estacion El Prado, Riobamba, Ecuador."

HCJB announces, "La Voz de Los Andes."

The laugh of the Kookaburra, or Laughing Jackass, Australia's laughing bird, identifies VK2ME.

The Daventry station can be recognized by Big Ben striking the hours.

RV59 broadcasts chimes from the Kremlin at 4 p. m., E. S. T.

HJ1ABB announces "La Voz de Barranquilla."

HJ4ABE says, "Achay Hota quatro ah bay ay, Medellin, Colombia."

The German stations have both men and lady announcers, and as a rule the lady announcer gives the schedules in English.

Telephone stations may be identified by determining the frequency on which they are heard and the language used. In some cases the station with which they are working will serve as a clue, as, for instance, a station heard near 15,600 kcs., calling "Allo Saigon" would undoubtedly be FTK, Ste. Assise, France, or a station near 8,800 kcs., talking to WOO would be a ship in the 8,831 kcs. band. In this case it would be necessary to listen to WOO to learn to which ship he is talking.

It is hoped that these few pointers will be of some assistance to our readers. If it will serve in even **a** small way to help some one derive a little more pleasure from his receiver it will have served its purpose.

# What to Do in Case-

#### (Continued from page 24)

ment, and these wires will not be found a part of the 5-wire cable from the set to the speaker, as mentioned by you.

#### Value of Volume Control

I have a Baldwin receiver which has a bad volume control. Can you tell me the value of this device?

You have not given the model of

this set. However, we are certain that the volume control resistance is 15,000 ohms. It also has an additional sensitivity adjustment of 1,000 ohms connected in series with the volume control; it is controlled by a screw in the rear of the chassis. An adjustment of this latter device may be of some help.

#### **B** Battery Eliminator

My Abox B battery eliminator has refused to work properly. What can be the trouble?

The Abox eliminator is similar to the Balkite device and utilizes the same parts, so if you are unable to procure Abox repairs you may use the same Balkite parts. These devices consist of a 110-volt power transformer that steps the current up to B battery potentials, or down to A battery filament voltages. Then, in series with the secondary output of the transformer, are a number of small cells, made of two plates-one of lead and one of aluminum-in tiny jars containing a saturated solution of borax and distilled water or boric acid. A choke coil and by-pass condensers complete the circuit to smooth out the rectified current coming from the electrolytic cells. Trouble. then, may be located in these cells, the transformer, choke coil, condensers, or associated wiring.

The cells must have new acid placed in them at least once a year. Most radio supply houses can furnish you with this acid—one bottle making a complete refilling of an Abox or Balkite eliminator.

#### Power for Converter

How can I obtain power from my General Electric a.c. set to operate a one-tube short-wave converter that I contemplate building?

Your converter, being a one-tube set, can take its filament and plate current from the General Electric radio set. If you will use a 57 tube in the contemplated circuit instead of the -24, you will lower the filament drain to a negligible amount. A wafer adapter, placed beneath one of your intermediate-frequency tubes (if of a type that draws 2.5 volts), will provide filament current and plate voltage sufficient to operate your short-wave adapter.

#### Tubes for Radiola III

Is it possible to use new tubes in my Radiola III? If so, please indicate how to make the change in wiring, if such is necessary.

The Radiola III is a battery type set using two -11 type tubes. These can be replaced to great advantage with -30s. But the sockets used for the -11s are the small types, and must be replaced with the medium 4-pin sockets, or adapters that were made to convert -11 sockets over to -12 type. As the filament voltage of the -11 is less than the 2 volts required for the -30s it will be necessarv to insert a 5-ohm resistor in series with the two dry cells (connected in series for 3.0 volts) connected to the A terminals of the set and its volume control rheostat.

# With the Editor

#### (Continued from page 13)

give us the names and addresses of some of the larger clubs in Canada and the United States?" If members of the various clubs will notify us at once, we will have a Club Directory in the June issue. Give us the date organized, number of members, initiation fee and yearly dues, names and addresses of officers to whom membership applications should be sent, and what service the members receive.

"How can I convert meters into kilocycles and kilocycles into meters?" is an inquiry we frequently receive. Radio waves travel at the rate of 299,820 meters per second. If we vibrate a radio signal at the rate of 1000 kilocycles per second, each resulting wave will be 299.82 meters in length. Therefore, if we divide the speed (299,820 meters) by the frequency in kilocycles we get the wave length. If we divide by the meters we get the frequency in kilocycles.

A much simpler method is to refer to our index of Short Wave Stations of the World as published in the April issue as this gives both meters and kilocycles for hundreds of channels.

A Cuban friend sends us the following clipping from the newspaper "El Camagueyano," which some of our Spanish-speaking friends may like to translate.

#### Can You Read It?

Así también nos complee men cionar el recibo de un ejemplar de la más interesante Revista dedicada a los Radioyentes en los Estados Unidos de América.

Nos referimos a "Radex" cuyo número de Enero tenemos a la vista, repleto de interesantís me material sobre Radio y detalles técnicos de la Industria mencionada.

"Radex" se edita en la ciudad de Cleveland, Estado de Ohio en al número 5005 de la Avenida de Euclid, donde pueden ustedes dirigirse solicitando "The All-wave Radio Magazine" por excelencia.

"I have a rather unusual hookup," writes Victor Julian, 4953 Saratoga Ave., Ocean Beach, Calif. "A 4-tube S.W. made to order, using the power pack of my old Victor Combination Model 32. The tubes in the S.W. are two 57s, one 58 and one 56. The plant in the Victor is one 83 replacing the old 80 and two 47s on adapters. They work well."

"I followed the diagram in the February issue," reports William Merrick, 17 Roland Ave., Cranston, R. I., "and attached headphones to my new General Electric J-79 with a switch to cut off the speaker. Now I can sit up all night and pull them in and not disturb anyone in the house." William is delighted with his new receiver.

### With the Radexers

#### (Continued from page 18)

M. Royal, 9544 Sand Point Way, Seattle, Wash. "I know I had the program down correctly, but a booklet is all they sent me. It is very interesting, but do you think it is a very good verification? I have not heard from JOLK yet. Several times lately I have heard the 9:30 P. M. news broadcast 'Japan time' and it has been in English. The Trans-Pacific reception this winter has been excellent. I had KGU, Honolulu, 13 evenings out of 15 last month. Also 2YA, New Zealand, nearly the same number of times."

"I had my first set in 1922, a onetube regenerative," reminisces Frank E. Hostetler, RFD No. 2, Box 101, Dillonvale, Ohio. "A Lincoln allwave d.c. SW-10 is my present receiver. My best DX verifications are 2LO, EAJ7, RUS, WKAQ, YV1BC, 2YA. Have written to 2BL for verification. Have twice heard OA1B at Negritos, Peru. The second reception was February 10th at 5:25 a.m. Listened in from Saturday EST. midnight to daylight. Heard 2BL, YV1BC, 2YA, and 10-AT at Trail, B. C., which was heard for over an hour. CMJK, 790 kcys., is on every Saturday night until about daylight."

"I have a Victor R-40, with a Stewart-Warner converter 301-A, and have quite a number of stations," writes D. W. Webster, 453 No. Vickers St., Fort William, Ont. "I have logged 180 b.c. stations and 16 s.w. stations. Last July I heard Schenectady broadcast a Rotary program around the world to Eindhoven, then Bandoeng, Java, and Australia and return. A shot was fired from Schenectady and it sounded as plain as if it were in the room where I was sitting. Since last March I have had VK2ME, Sydney, Australia, every Sunday at 7:30 p. m. EST, and I have this verified."

"Tell the boys who are having interference on the 770 kc. band," suggests H. E. Elsen, 1801 Rose St., Berkeley, Calif., "that without doubt the interference is coming from JOHK, Sendai, Japan. They don't give me much to work on, in the line of a logged program, but there isn't a night that I don't play JOHK for a few minutes. When they are on and WBBM is also on, I'd never know WBBM was on except when JOHK fades. On two or three occasions they have nearly drowned out KTM, which is only 500 miles from here and ten kilocycles higher frequency. I don't say that they are always that strong, but it is the rule rather than the exception."

"I have had a 16-tube Midwest allwave set for about three months and have already logged about 600 stations with it," remarks Arthur F. Pierce, Jr., 332 Bay St., Springfield. Mass. "I have heard at least one station on each of the regular broadcasting channels and covered all but six states in the Union. Although I have nothing but an inside aerial my log includes Canadian, Cuban, Porto Rican, and Mexican stations on the regular broadcast band. I get the most enjoyment from the short waves because it is my first experience with them. In addition to about 200 amateurs, 62 aviation calls, 46 police stations, and 3 television stations in the United States and Canada, I have had fine reception of short-wave broadcast and phone stations in the United States, Canada, Mexico, Bermuda, Venezuela, Colombia, England, France, Spain, Germany, Italy and Argentina."

"Was playing the b.c. band about 4:00 a. m. today," postcards R. N. Putnam, 920-12th Ave., N., Fargo, N. D., "and had HJN, Bogota, Colombia, on 685 keys, coming in great. Also had several Aussies and Zedders again. Funny part of it is that early in the evening I could hardly get any U. S. stations as static was bad and reception poor. I have just obtained a Stewart-Warner s. w. converter to go with my Philco 90. So far I'm not doing so well with the foreign, but am living in hopes. By the way, do you know of any way to fix the above named converter to get below the 20meter band? Say to about 13 or 15 meters."

"I am writing to give you a tip on NAA," suggests Benjamin Genung, 340 Arch St., Spring City, Pa. "Their schedule is 11:56 a. m. to 12 noon, time signals, and 9:55 p. m. to 10:00 time signals, and 10:00 p. m. weather reports. They come in on 690 kcys. I use a 6-tube Atwater Kent radio. After WPTF signs off I can hear CMAF clearly. I have listened on 920 kcys. for hours and an announcer talks in Spanish but I have never heard him announce the call letters."

"I mailed a report of a fifteenminute frequency test to WCAX December 16th," complains Chas. L. Morgan, 800 East 179th Street, New York City. "I gave them a full report from 2:15 to 2:30 a. m. when they signed off. I have written to both the engineer and the manager but they will not answer. That is the only station in Vermont I have not logged and I do not log a station until I have the verification. I wish I could get WCAX to verify as we cannot get him on regular programs on account of interference.'

"I have a Stewart-Warner Model 102-B long and short-wave set," writes Ed Clayards, 2518 Bowker Ave., Victoria, B. C. "My aerial is 150 feet long and 60 feet high. Ι get all the eastern and Alaskan stations and Japs on six tubes long The short wave works very wave. good, getting all 'hams,' police cars, coast guard, and several stations in Europe. Those amateurs certainly did work hard the night of the California earthquake. They deserve a lot of praise, relaying messages and calls."

"My most interesting catch," says B. S. Hastings, 4333 Carlbrook Ave., Montreal, "was the reception of KFOX, Long Beach, describing earthquake scenes. This was received at 5:50 a. m. in broad daylight but with excellent strength. After about ten minutes it began to fade and then passed out. A few minutes later I received WGCM, Gulfport, Miss., with good volume—not bad for a 100-watter in daylight."

"I am using a Pfanstheil converter with my Silver-Marshall 724 a.c., with great results," comments Wm. E. Stillwell, 2940 S. Logan St., Denver, Colo. "Have picked up EAQ, HKA, HKD, and YV11BMO which came in like a local station on two occasions, both being on Monday. Picked it up at 4:00 p. m. MST and kept it until it signed off at 8:00 p. m. MST. They announced in English."

Thomas Anderson, 449 McIntyre Street, Regina, Sask., submits the verification he received for daylight reception of Dublin, Texas, when it was using only fifteen watts. This gives him a mileage quotient of 86. This was with a 6-tube Marconi using eliminators. Now he has a 13-tube all-wave Marconi and says he can get Europe almost any day on the short waves.

"A few days ago," postcards J. A. Shanks, Russellville, Tenn., "I picked up two stations in Montana, KGHL and KGIR, both the same morning. Last Friday morning I brought in two new 100-watt stations in Arizona KPJM and KGAR, both within about five minutes of each other. February 26th I had HJN, Bogota, from 2:39 to 4:02 a. m. They came in like a local without fading."

"I certainly enjoy radioing around," writes Mrs. R. Furley, RFD No. 6, Mt. Vernon, Ohio. "I am not going to be satisfied until I hear from every state in the Union." Mrs. Furley has had a new Kolster International for only a week and already has 20 states on her roster.

"I have just received a verification of the reception of a radio program I heard at 5:00 a. m. EST Christmas morning, all other stations on 900 kcys. being silent at that time," reports W. G. Kohler, 333 Tioga St., "It was station Johnstown, Pa. KGBU, Ketchikan, Alaska." "Saturday at 9:15 p. m., after WPTF signed off," says Joe Tamele, 13201 Coath Ave., Cleveland, Ohio, "I picked up CMAF without touching I sent for a verification. the set. I am sure they are on 680, but for a 500-watter they sure come I've picked them up before in.

on the same dial setting." "Try for 2YA on 720 about 2:00

a. m. PST," urges H. E. Elsen, 1801 Rose St., Berkeley, Calif. "I get them every night at this time, but can't get them before 1:55 a. m. or after 2:30 a. m. good enough to log their program."

"KGEK is on from 11:30 p. m. to 1:30 a. m. MST each Friday; KID is on daily from 8:00 p. m. to 12:01 a. m. MST every day; KFWI is on daily until 1:00 a. m. PST," contributes Roger D. Cause, P. O. Box 6688, Lester, Penn., who wants to know if anyone has yet received XENT.

Radio station WJAG has accepted the invitation of the New Zealand DX Club to broadcast a special program for New Zealand listeners from 12:01 to 2:00 a. m. CST on Sunday, April 30, 1933. It will be 5:30 to 7:30 p. m. standard time, or 6:00 to 8:00 p. m. summer time in New Zealand. Since New Zealand climate is the opposite of Norfolk, Nebr., the length of day there will be similar to that of Norfolk on October 30th.

The station will conduct the program as a "Salute to New Zealand." The station has asked the Premier of New Zealand to cable a special message to be read on the program.

Two of the best known DXers in the country submit opposite views on the subject of DX logs. Neither desires his name used. Writes Mr. A.: "No one cares if I've logged 1400 or 1500 stations in the ten years I have been DXing. It's what is being heard at present that counts. Alltime records are not fair to those who have taken up DXing in the last two or three years. They discourage the newcomer and hurt DX." Says Mr. B.: "It is the old-timer who really started DXing and who forms its backbone today and I believe they should be duly credited for their persistence in continuing in the the face of constantly rising odds against their chance of catching a new one. After 700 are logged then comes the time for the most careful and systematic tuning. In other lines of endeavor, a

person is given credit for past performance and such credit grows as time goes on. If a station is depleted does its deletion change the fact that it was heard?"

# Mutual Aid

#### (Continued from page 26)

would be church time in England, Bill is naturally curious to know whether he could have had London on 843 kcys.

"On January 23rd at 6:00 p. m., AST., I heard a clock striking the hour of ten, on 825 kcys.," writes Robert Osborne, Stellarton, N. S. "Couldn't catch the announcements owing to interference from WHDH and WHAS. It sounded like French."

"Does anyone know where I2TAL is located?" asks Robert R. Rawstron, Claremont, N. H. "He was heard January 21st on 800 kcys., with Marimba concert, and requested letters often and gave his call frequently, but no location. English was spoken."

### In High Frequencies

#### (Continued from page 30)

John C. Fulton, 70 Peace St., Providence, R. I., would like to hear from other short wave fans.

Good reports have been received from W. H. Davis, Jr., 2108 H Street, N. W., Washington, D. C. (26 stations); Herman Hurley, 1559 7th St., Louisville, Ky. (14 stations); and D. B. Lumsden, 514 W. Morgan St., Raleigh, N. C. (8 stations). Among the best stations mentioned by Mr. Davis are HKD, YV1BC, HVJ, EAQ, EAN, HKA, VK2ME, RV15, and DJD. Mr. Hurley says his prize catches are DJA and HBL, which he says, "were both heard while W1XAZ was bearing down, without any interference." Mr. Lumsden reports VK2ME, DJB and YVQ as his best stations.

# Canadian Police Broadcasters

Police stations in the Dominion use the following seven requencies:

a 17.330 megs. 17.3 meters. b 7.456 megs. 40.21 meters. c 6.420 megs. 46.7 meters. d 4.772 megs. 462 meters. e 3.458 megs. 86.7 meters. f 2.414 megs. 124.17 meters. Galgary, Alta. Cranbrook, B. C. Edmonton, Alta. Grande Prairie, Alta. Kamloops, B. C. Letbbridge, Alta. Montreal, Que. Nelson, B. C. Peuce River, Alta. Pentieton, B. C. Prince Rupert, B. C. Saint John, N. B. Vancouver, B. C. Viancouver, B. C.	CGS UZN CGJ CFN UZH CFO UZH UZI CKT UZG CJW UZG UZF UZF UZF UZW	acdef cdefg cdefg cdefg cdefg bedefg bedefg bedef bedef bedefg bedefg bedefg bedefg
Winnipeg, Man.	UYW	f

#### QUICK INDEX to STATION DATA

#### Broadcasting Stations Verification Information.....April No. 68 Time on the Air

Time on the Air		
Sunday		
Monday	No.	62
Tuesday	No.	63
Wednesday	No.	64
Thursday Jan.	No.	65
Friday		
Saturday Mar.	No.	67
Complete EuropeanJan.	No.	65
European Time on the AirMar.	No.	67
Trans-Pacific Time on the AirFeb.	No.	66
World Broadcasters by Frequencies. Nov.	No.	63

#### Short Wave Stations

Foreign by Countries	Sep.	No.	61
World by Calls			
World by Frequencies	Apr.	No.	68
United States by States	Nov.	No.	63
Canada by Provinces			
Police Broadcasters of U. S	Mar.	No.	67
Sunday on the Short Waves	Mar.	No.	67

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